AIR MAIL

CANCER

May 3, 1950

Dr. N. P. Schenker
Stampfenbachstr. 56
Zurich, Switzerland

Dear Pen:

I wish to thank you for your note which you wrote before leaving the country. I hope you have had an interesting time and that I will see you soon again. I hope that you will be able to start production after your return; but whether or not you will be tied up completely in production, I need not say how happy I will be if you have some time to work with me on film analysis.

I am writing to you with regard to a specific problem and in the hope that you can help me. The Medical Film Institute has a contract to prepare a critical catalog on films applicable to cancer teaching, as I have told you before. I want to put this project on an international basis. For this purpose I am trying to find pertinent films in Europe. Could you please help me in this respect? I need not say that only films of scientific and teaching value, and of good cinematic quality are of interest. Moreover, for technical reasons, it would be desirable that such films are available in 16mm prints, since the transportation and projection of 35mm prints would present great obstacles, as you know. If you can help us to find sources of such films and prepare a list of them, Dave and I would appreciate it greatly.

I hope that you are doing well. Best regards from Margaret and myself to you and Mrs. Kunzli.

Cordially yours,

Adolf Nichtenhauser, M.D.

AN:ERW

CANCER

Feb. 4, 1952

Memo

To: Medical Audio-Visual Institute: Drs. Ruhe and Nichtenhauser
From: Erik Cripps and Marie L. Coleman

Subject: Cancer Film recommendations to State Dept.

THE TRAITOR WITHIN

Excellent for foreigh language version. Treatment exceedingly simple and effective. Recommended.

Proposed changes: Faces which introduce film could be deleted as they are (1) Not necessarily identifiable to all audiences, (2) Purely negative, (3) Considerable extra production cost to put sound on this section as they are post-sync.

The points negatively made by faces are immediately and positively answered. Slight amplification of narrative, instead, would make points quite clearly.

CHALLENGE OF SCIENCE AGAINST CANCER

Photographically excellent, but far too long and confused. Makes unnecessary atristic trials unsuccessfully. Information and emotion admixed to detriment of each.

A possible film by re-narrating which will eliminate conflicting sound levels, and drastic cutting which will achieve considerably more clear-cut production. The wonder, the metaphysical, should be the last or penultimate sequence. Lab scenes sustain and with direct narrational information should be most effective.

Not recommended without above changes.

FROM ONE CELL

An excellent example of a bad instructional film in that parts — especially the art work--are graphic and convincing, but as a whole the film fails in that no care has been taken in the script to ensure what has to be said, and to whom. The opening shots are overly-dramatic and only lead into a condensed description of mitosis and cell division of paramecium. This is followed by statement of embryology from fertilized ovum, blastosphere, embryo baby, growing child--all cursory, all without previous knowledge, all inadequately related and hence confusing. Follows a description of degeneration, regeneration of skin tissue from a cut. (The art work is excellent here and might well be used in another film).

A slide is then shown of striated muscle. If you recognize it, you wonder why. If you don't, it's waste footage.

Finally cancer is mentioned. The preamble above is far too discursive at variant levels of knowledge and takes 3/4 to 5/6 of the film. Living cancer cells are shown, without annotation or diagram to help identify. To the layman this must be confusing and disjointedly disturbing. The information on "what" is so condensed after the previous scramble as to be difficult to absorb even if it is intelligible. The transition from normal regeneration to carcenogenic cells is not made clear and leaves one with the impression that unless a cut heals according to the normal procedure described, cancer sets in. Also, the lymph system, while mentioned as being vitally operative for transfer of cancer cells, is not explained.

Although the film widens to show what is being done technically, this is done weakly--just a few shots. The narrator suggests, with obvious finale inflection--that as with strep, etc., in the last few years, so with cancer in the future.

Not recommended.

THE DOCTOR SPEAKS HIS MIND

A doctor, driving his car, surveying his town from a hill, walking, standing, sitting in his office, broods on the folly of mankind in not seeing the doctor in time, in going to quacks, etc. Boring, rambling, non-specific, deadly, worse than mediocre.

Not recommended.

TIME IS LIFE

Essentially, an educational film to alleviate anxiety and shame regarding cancer. Follows a woman from her initial suspicion to her visit to Am. Cancer Society, to doctor, to biopsy and negative findings, to volunteer work and experiences with Am. Cancer Society. To be useful film would have to be cut (beginning) and completely re-narrated. Final portion is designed for volunteer recruiting for ACS and as such would not be especially suitable for foreign audiences.

Not recommended.

/////

CANCER

MEDICAL AUDIO-VISUAL INSTITUTE OF THE ASSOCIATION OF AMERICAN MEDICAL COLLEGES

Selection of Medical Motion Pictures for Use by the Department of State

Order No.: NY-11547-(14)-52

NOT RECOMMENDED

Classification: HEALTH EDUCATION
Cancer

Title of Film: THE DOCTOR SPEAKS HIS MIND

PHYSICAL DATA

Year of Production: 1948
Format: 16 mm., black-and-white, sound, 800 ft., 22 min.
Type of Sound Track: Narration and some lip-sync.
Sponsor: American Cancer Society; Producer: Caravel Films, Inc., N.Y.;
Supervision: Film Counselors, N.Y.
Distribution: American Cancer Society, 47 Beaver Street, New York 4, N.Y.;
Sale: $27.44; Loan.

CONTENT SUMMARY

A country doctor leaves a patient, enters his car, drives along, stops on a hill, looks at his town, sits down on the fender of his car, looks again over the hillside. During this time, his voice recites what he is thinking. He thinks of the cancer patients who go too late to the doctor; that he would like to call all people together to tell them the truth about cancer and cancer statistics. Shots of a baseball pitcher are cut into this monologue; he had a mole on his leg which developed into cancer. He died because he did not go to the doctor. The same fate befell a school teacher who had no time to see the doctor before a vacation trip. Driving back to town, the doctor remembers a coughing service station attendant. The man died of lung cancer because he did not see the doctor. Returning to his office, the doctor remembers an old woman who is seen visiting a quack; she also died. On the other hand, the doctor discovered cancer early in a policeman during his routine physical examination. X-rays cured him. A woman is seen in the doctor's office, and then as she is wheeled into the operating room. She, too, was cured. A "businessman" is seen being examined by the doctor, who says that he discovered early mouth cancer in him. The patient is said to have been successfully operated upon. The doctor now stops to reminisce, and addressing the audience he urges them to see their physician every six months for a check-up. A title listing "Cancer's Seven Danger Signals" closes the film.

APPRAISAL

A doctor drives around in his car while his voice narrates for a full twenty-two minutes some boring, rambling, non-specific information, interrupted only by a few brief scenes in which people representing deceased or cured

cancer patients are seen at home, at work, in the doctor's office, or being wheeled into the operating room. This intellectually and artistically indifferent treatment of an important subject cannot impress any audiences. In order to do this, the film would have needed strong human drama. The dictum, at the end of the film, that everyone should have a semi-annual physical check-up is broad and unqualified in its disregard of age and circumstances. The film completely forgets to indicate whether early cancer can actually be discovered by such semi-annual examinations, and what diagnostic methods are used for this purpose. Even some less sophisticated viewers may doubt that the superficial examination methods of the country doctor can in any way detect early cancer hidden in internal organs. On the whole, content and presentation of the film are ineffective to put over the intended important message.

RECOMMENDATION

The film is not recommended for use by the Department of State.

March 12, 1952.

CANCER

MEDICAL AUDIO-VISUAL INSTITUTE OF THE ASSOCIATION OF AMERICAN MEDICAL COLLEGES

Selection of Medical Motion Pictures for Use by the Department of State

Order No.: NY-14547-(14)-52

NOT RECOMMENDED

Classification: HEALTH EDUCATION
Cancer
Biology

Title of Film: FROM ONE CELL

PHYSICAL DATA

Year of Production: 1950.
Format: 16 mm., color, sound, 470 ft., 13 min.
Type of Sound Track: Narration.
Sponsor: American Cancer Society; Producer: Sturgis-Grant Production, Inc., in cooperation with The Memorial Hospital and The Sloan-Kettering Institute, New York; Technical Adviser: Douglas A. Sunderland, M.D.; Direction: Warren Sturgis; Animation: Dwinell Grant.
Distribution: American Cancer Society, 47 Beaver Street, New York 4, N.Y.,
Sale: $48.50; Loan.

CONTENT

The film begins with a man collecting a sample of water from a stream in a forest. He observes a drop of it under the microscope and finds Paramecia (nothing else!). The structure, food intake (but not elimination) and reproduction of Paramecium are shown in animation and cinemicrographs. From here, the film turns to the female germ cell, and animation depicts fertilization, mitosis, and formation of the blastula. The statement, "Certain groups of cells form buds which later become different organs," is illustrated by a drawing of the forming lungs. A drawing of an embryo, with labeled organs, is shown, then a baby, then a child, while the narration talks about growth and differentiation of the cells. That muscle cells are responsible for movements is illustrated by a stained section of muscle fibers, and as baseball-playing boys are seen it is stated that "all cells together make up a living and thinking human being." Next, the film takes up the fact that "cells do not last forever"; this is illustrated by an animated sequence diagramming the structure and regeneration of the skin. One of the baseball-playing boys cuts his finger, and animation sketches the formation of a blood clot and the regeneration of the lost body tissue, as a "result of cell division." A leg, in animation, with a fading out blood vessel is seen, and then a boy with a leg cast, while the narration talks about cell degeneration due to reduction of blood supply. An old man and the shriveled skin of his hand are shown to illustrate the same point. Sometimes, cells keep on multiplying, which is shown in animation. The narration speaks of the rapid growth and reproduction of cancer cells, illustrated by a cinemicrograph of such cells in tissue culture. Diagrams of various body organs

serve to illustrate the point that cancer can grow "any place," and the formation of metastases from a stomach cancer in the surrounding organs and lymph nodes is diagrammed. Juxtaposed histological sections of cells from a cancerous stomach and from a lymph node metastasis are used to emphasize that the "growth" in both is identical. Cancer posters follow each other rapidly. A microscopist looks at what appears to be a cytological smear as the narration states that "many new tests have been devised." A series of shots illustrating "research" accompanies statements regarding its progress, the onslaught of science on cancer, etc., until "some day cancer itself will be conquered."

APPRAISAL

Content: The exact objectives of "From One Cell" are shrouded in mystery, apart from the fact that in the last one or two of its thirteen minutes the picture suddenly turns into a so-called cancer propaganda film, playing up, though not specifying, the progress of cancer research and promising, equally vaguely, the conquest of the disease. Before reaching this climax the film takes up the following topics: Cell structure, unicellular organisms, amitotic reproduction, the female germ cell, mitosis, development of the human embryo, postnatal growth, cell differentiation, wound healing and tissue regeneration, cell degeneration and neoplastic growth. Most of these topics are treated in a sketchy and cursory fashion, and they lack correlation and do not form a meaningful whole.

Presentation: The presentation of the subject suffers from a corresponding lack of intellectual clarity and instructional acumen. There are some static and wooden "live" scenes--the man collecting a sample of water from the forest stream, the disjointed shots of the boys stiffly posing a baseball game. Obviously designed to create "human interest," these scenes make little sense in terms of any instructional objectives the film may possess. Much of the film consists of animated diagrams. Some are clearly designed, others are too schematic, but all of them are too abbreviated to be understood by those not already familiar with the subject. The narration remains on a generalising level, using popular--and often vague--terms, and, on the whole, fails to interpret the more specific, though somewhat rapid images. The phases of the mitosis, for example, are labeled with such specialist terms as "Anaphase," "Interphase," etc., while the narration limits itself to speaking of "cell division." The absence of expository treatment may also lead to crucial misunderstandings; the similarity in shape of the animation of the healing wound and of the growing cancer can create the idea in the uninitiated that unless a simple cut heals normally cancer sets in. The film becomes educationally most spurious when it presents cinemicrographs. Unlabeled, unmarked, and uninterpreted by the narration, they are unintelligible to the layman. Moreover, what purpose is served by "illustrating" the statement that movement is caused by muscle action if what is shown is merely a stained section of striated muscle fibers? (Not to mention the fact that the inclusion of this topic characterizes the amorphous nature of the content.) The view of the tissue-culture cells is not only meaningless to the uninitiated but also misleading, insofar as it is not mentioned that the rapid cell divisions and movements visible are due to their having been filmed in time-lapse. And it does not help understanding when some fuzzy cinemicrographs of primary and secondary cancer cells are accompanied by the words, "... we can see that the new growth is clearly the same type as the old."

Effectiveness: Not only is it unclear what the film wants to teach, but also to whom it is addressed. General lay groups will fail to understand what this film is for, apart from being told that cancer may be under control some day. They will look at animated drawings and cinemicrographs which pass too quickly and are not clearly explained, and they will soon tire and become confused. Senior high-school students, who have learned their biology lessons, will obtain a sketchy visualization of some topics and be able to make out this or that detail. Biologists and physicians who happen to view this film may, after some deliberation, conclude that it perhaps attempts to hint vaguely at a few biological and cytological facts and concepts—but not at all important ones—that enter into a consideration of cancer formation; if so, even the professionals will wonder what the normal embryonic development, or the baseball playing which expresses that "all cells together make up a living and thinking human being," has to do with the subject.

RECOMMENDATION

In summary, it can be said that "From One Cell" is a bad educational film in general, and hardly of any value as a cancer education film.

February 23, 1952.

FILM NOTES

May 1921

Caesarian Section, Low Cervical Type.
By H.B.Tuttle

Practically continuous, lasting 15 minutes. Sudden end during peritoneal suture (end missing ?). Only one jerk, during uterine suture.

Camera in one rigid position in front of patient and at level of abdomen. Distance a little too great, showing not only hands but also lower arms of operators. Very often the view is obstructed by hands, arms and shoulders.

The titles indicate only the steps of the operation, like "closing the peritoneum over uterine suture," but do not go into any explanation of the technique.

Orthochromatic film, wound and red parts almost black, which makes it very hard to discern the details.

No organization of material attempted. The operation is simply filmed, from beginning to end.

16 mm., sound, b & w., 1026 ft., min.

TITLE SHEET

BRITISH INFORMATION SERVICE

presents

"SOME ASPECTS OF ACCESSIBLE CANCERS"

(Text see Film 1.)

(4) BREAST

Principal Medical Advisers:

WESTMINSTER HOSPITAL

Sir Stanford Cade, KBE, C.B., FRCS., M.R.C.P.
R. Cox, M.B.E., F.R.C.S.
F.M. Allchin, M.B., B.S., D.M.R.E., F.F.R.
T.M. Prossor, B.Sc., F.R.C.S. (Edin.), D.M.R., D.M.R.T.

THE ROYAL CANCER HOSPITAL:

D.W. Smithers, M.D., M.R.C.P., D.M.R.
R.C.B. Ledlie, F.R.C.S.
A.D. O'Connor, M.B., B.Ch., B.A.O., D.M.R.

A C.O.I. film made for

THE MINISTRY OF HEALTH
by

Realist Film Unit

Photography ..... A.E. Jeakins
Associate Producer .. Edgar Anstey
Director ..... Jack Ellitt

(Crown Copyright Reserved)

Nearly 8000 women in England die every year from Cancer of the Breast.

Yet in the larger treatment centres where surgery and radiotherapy are employed to best advantage, nearly 80% of the patients treated in the earliest stages of the disease are alive and well 5 years afterwards.

But of ALL patients treated, however advanced the disease, only 30% survive 5 years.

The immediate problem therefore is not only the discovery of a cure, but the efficient treatment of all patients at an early stage of the disease.

The urgent need is EARLY DIAGNOSIS as well as EFFICIENT TREATMENT.

IN WOMEN with efficient treatment nearly 80% in the early stages, and 30% of all cases, however advanced,

SURVIVE 5 YEARS.

Yet nearly 8,000 women in England and Waled continue to die every year from Cancer of the Breast.

16 mm., sound, black & white, 1036 ft., min.

TITLE SHEET

BRITISH INFORMATION SERVICE

presents

"SOME ASPECTS OF ACCESSIBLE CANCERS"

The film you are to see is one of a series made by the Ministry of Health for general practitioners and other professional audiences.

The sites chosen are those that offer good prospects of cure if diagnosed and treated early.

The emphasis is not upon any particular method of operating or treatment, but upon the actual result in terms of added years of normal and useful life.

It is hoped that these films will help general practitioners to keep the possibilitity of cancer constantly in mind when seeing patients with symptoms suggestive of this disease.

They emphasise the importance of sending such patients to a hospital clinic for consultation as early as possible.

The series of films has been made under the general supervision of

SIR STANFORD CADE,
K.B.E., C.B., F.R.C.S., M.R.C.P.
MALCOLM DONALDSON,
F.R.C.S., F.R.C.O.G.
the late G.F. STEBBING
F.R.C.S., F.F.R.

and with the co-operation of the patients and staff at the hospitals named at the beginning of each film.

Some Aspects of Accessible Cancers

(1) SKIN

Principal Medical Advisers:

THE ROYAL CANCER HOSPITAL:

D.W. Smithers, M.D., M.R.C.P., D.M.R.
H.W. Gordon, M.C., B.A., F.R.C.P.
A.H. Hunt, M.A., Mch., D.M., F.R.C.S.
A.D. O'Connor, M.B., B.Ch., B.A.O., D.M.R.

Title Sheet (cont'd.):

WESTMINSTER HOSPITAL:

Sir Stanford Cade, K.B.E., C.B., F.R.C.S., M.R.C.P.

MIDDLESEX HOSPITAL:

B.W. Windeyer, F.R.C.S., F.E.R., D.M.R.E.

MOUNT VERNON HOSPITAL & RADIUM INSTITUTE:

A. Durden Smith, F.R.C.S.

A C.O.I. film made for

THE MINISTRY OF HEALTH

by

Realist Film Unit

Photography ..... A.E. Jeakins
Associate Producer .. Edgar Anstey
Director ..... Jack Ellitt

(Crown Copyright Reserved)

Skin Cancer Deaths
(England and Wales)
1942 1006
1943 1094
1944 1025
1945 1068
1946 960
1947 1011

Grounds for Suspicion
1. Persistence
2. Lack of Response to Ordinary Treatment Methods
3. Painlessness
4. Breaking down and Ulceration

EPITHELIAL TUMOURS OF THE SKIN
Basal-Cell Squamous-Cell
Baso-Squamous-Cell

MALIGNANT EPIDERMOID SKIN TUMOURS
Incidence
Basal & Baso-Squamous Celled Carcinoma
70%
90% appear on Face and Neck
10% appear on other parts of body

Incidence
Squamous-Celled Carcinoma
30%
75% appear on Face and Neck
25% appear on other parts of body

INTRA-EPIDERMAL
(Basal or Squamous Cell)

Bowen's Disease
Queyrat's Erythroplasia
Paget's Dermatosis
Multiple Superficial Epidermal Carcinoma

Histological Types. III

Malignant Melanomas
Salcomas
Lymphoid Tumours
Secondary Tumours

Predisposing Factors and Pre-cancerous Lesions

Sunlight	e.g. Farmers
Scars	e.g. Burns
Infections	e.g. Lupus Vulgaris
Ulcers	e.g. Varicose Ulcers
Sinuses	e.g. Osteomyelitis
Industrial Irritants	e.g. Pitch
Excreted Irritants	e.g. Arsenic
Radio-dermatitis	

Any ulcer that does not respond to three weeks conservative treatment should be sent to the nearest general hospital or Cancer Clinic for further investigation.

Out Patients Department
Skin Clinic

Treatment Basis:
1. by Histology
2. by Site
3. by Extent

Treatment Basis
By Site - Surgery
Trunk
Limbs
Cosmetically less important
Close over bone or cartilage
Sites liable to radionecrosis

Treatment Basis
By Site - Radiotherapy
Face
Eyelids
Cosmetically more important
Good blood supply
Sites not liable to radionecrosis

Treatment Basis
By Extent.

Extensive tumours are sometimes best treated by a combination of radiotherapy and surgery.

RESULTS OF TREATMENT
Basal-Cell Carcinoma

Over 90% should remain free from recurrence after efficient Radiotherapy or Surgery.

Nearly 100% are free from recurrence when Radiotherapy and Surgery are both available separately or together ... as required for each patient.

RESULTS OF TREATMENT

Squamous-Cell Carcinoma

Approximately 75% are recurrence free at 5 years with efficient Surgery or Radiotherapy.

Grounds for Suspicion

1. Persistence
2. Lack of response to ordinary treatment methods
3. Painlessness
4. Breaking down and Ulceration.

CANCER

MEDICAL AUDIO-VISUAL INSTITUTE OF THE ASSOCIATION OF AMERICAN MEDICAL COLLEGES

Selection of Medical Motion Pictures for Use by the Department of State

Order No.: NY-14547-(14)-52

RECOMMENDED

Classification: HEALTH EDUCATION
Cancer

Title of Film: THE TRAITOR WITHIN

PHYSICAL DATA

Year of Production: 1946.
Format: 35 mm and 16 mm, color, sound, 354 ft., 10 min.
Type of Sound Track: Narration.
Sponsor: American Cancer Society; Producer: John Sutherland Production; Direction: George Gordon; Animation: Pete Burness, Irven Spence, and Elmer Swanson.
Distribution: American Cancer Society, 47 Beaver Street, New York 4, N.Y.;
Sale: $50; Loan.

CONTENT

(A detailed content description is available on request.)

APPRAISAL

Of five cancer education films reviewed, THE TRAITOR WITHIN is the only one meeting to some extent the specification of the Department that it should be applicable "for world-wide usage with general audiences."

In comparison to the other four films this one tells its story relatively clearly and simply. The film deals briefly and in a well-balanced fashion with these points: (1) Common misconceptions about cancer, and their rectification; (2) Normal cells and cancer cells; (3) Cure of early cancer by surgery and irradiation; (4) Dissemination of untreated cancer; (5) Common cancer sites, and cancer signs and symptoms; (6) Need for early medical care.

Every portion of the content is essential for the basic message except that dealing with the normal metabolism and the role of body cells in it, which pictures cancer in terms of individual cells. This is unnecessary, and unnecessarily complicating, for the purposes of the film. On the other hand, the film omits the far more important and graphic concept of cancer as a rapidly growing and spreading tumor which invades and destroys normal organs and tissue structures. This concept would also have been visually far more impressive than the somewhat juvenile and platitudinous symbolism representing the body organs as "factories," the normal cells as "factory workers," and the cancer cells as black polyp-like monsters.

The inclusion of the sequence on normal and cancer cells also largely fixes the audience level. In order to understand this sequence the audience

must know the concepts of the cell, of "lymph canals," and of cell division. The section on the dissemination of cancer presupposes elementary knowledge of sytemic circulation, although this may not be essential for grasping the idea of "spread through the bloodstream." The rest of the film is understandable on a very elementary audience level, except that it is conceivable that some audiences in less developed countries may have no concept of an X-ray machine and of radium.

The message of the film is conveyed in form of a cartoon with narration. Although the style of animation is smooth and pleasant, the visual content suffers somewhat from overdiagramming and abstraction, and, as mentioned before, its symbolism of body organs and body cells is rather contrived. The film lacks the imaginative concreteness of a Disney health film and its clarity, function and power of retention. In particular, although the cancer sites are shown three times, and the principal signs and symptoms of cancer are enumerated in the narration, this presentation is visually too empty and too rapid to be impressive and easy to retain. Here again, visual representation of the growing tumor in each location (rather than merely a red circle) would have been more effective, and the coughing and hoarseness in cancer of the respiratory organs could have been acoustically indicated.

RECOMMENDATION

The film is recommended for use by the Department of State.

SUGGESTIONS FOR FOREIGN-LANGUAGE VERSIONS

1. Omissions:

At the beginning of the film, the grotesque ugliness of the faces making superstitious remarks is out of line with the visual style of the rest of the film. In addition, this sequence is also unnecessary because the points made negatively are immediately argued out positively in the subsequent sequence.

The sequence of the ugly faces should therefore be deleted. (From "My dear, what a terrible disgrace" to and including "Don't be a sucker.")

2. Revisions:

There is not much that can be simplified in foreign-language narrations, for even if an audience does not know what a cell is, there is no simpler word to serve as a substitute.

The sentence, at the beginning, "Every three minutes a person dies of cancer," refers to the United States only and should be changed to "Every... seconds a person dies of cancer somewhere in the world." (Check world cancer mortality; probably one death every ten or twelve seconds.) In order to prevent less educated audiences from believing that cancer cells are actually black polyp-like monsters, a phrase should be used such as "The cancer cells, as if they were black monsters..."

SUGGESTIONS FOR UTILIZATION

Any audience that is not already familiar with the message is likely to ask questions; even if it does not, it should receive additional information. It is therefore advisable to use this film always under the guidance of a qualified person, such as a physician, health educator, trained nurse, or informed school teacher.

Audiences who have never heard of cells will miss the meaning of the respective sequence. This is no great loss in terms of the over-all message of the film, but the person conducting the screening should be able to provide the necessary explanations if requested, perhaps with the aid of illustrative material.

Because of the schematic and elementary nature of the film it is necessary to provide audiences with more specific information. One type of such information should expand the points raised by the film and go into some detail in regard to cancer signs and symptoms, the need for early diagnosis and the rationale of therapy. Another type of information should deal with local resources and facilities for cancer diagnosis and treatment. In addition to a discussion of these points by the speaker, literature could be distributed to the audience. It is suggested that the Department take up the question of utilization materials with the U.S. Public Health Service; in addition, the Institute of Inter-American Affairs has had experience in this matter. It is possible that THE TRAITOR WITHIN will fit into the education programs of health or cancer agencies in various countries. These agencies could employ existing literature and posters in connection with showings of the film.

March 17, 1952.

23 Dec. 1948

CARDIAC IRREGULARITIES
2 reels, black and white, silent
45 minutes
Produced by Eastman Medical Films, 1929

~~Reel 1~~:

Experiments on the exposed dog heart. First the parts of the heart are explained on two frozen photographs of the experimental hearts. A drawing of conduction system.

Disturbances of impulse initiation such as sinus arythmia, sinus tachycardia and others. In the second reel ventricular extrasytoles, paroxysmal tachycardia, ventricular tachycardia, auricular and ventricular fibrillation, disturbances of impulse conduction (incompletely partial and complete block).

Apparently the film was made from research material taken by Wiggins and was very superficially organized into a teaching film. Some but not all irregularities are introduced by a drawing of the heart in which the ~~xxxxxx~~ type of conduction irregularity is indicated by dots. However, the heart itself does not move so that the effect of the disturbance upon the contraction is now shown. This renders it difficult in most cases to follow the movement of the experimental heart. One reason for the difficulty is that it is physically impossible or difficult to perceive at the same time both the rhythm of the ~~xxxxxxx~~ auricles and ventricles. In the beginning the heart movement is shown in moderate slow-motion, but it is not indicated whether the rest of the film is in slow-motion or not; probably the latter is the case. Sufficient slow-motion would have made observation much easier. The titles are generally much too condensed and too brief on the screen.

The sequence can very often not be recognized. The stimulation is not expressly indicated in the film. In ventricular tachycardia the distended ventricle covers the auricle so that the asynchronous contractions cannot be

observed. On the whole this is a film which may be of use only to advanced students of physiology but would fall down in the classroom. In many of its parts it would require frame-by-frame analysis.

22 Dec. 1948

CATARACT EXTRACTION
1 reel, black and white, silent
15 minutes
Produced by Eastman Medical Films, 1931.
Operation and Cinematography by Frank Claveloux Barker, M.D., Wills Hospital
Philadelphia, Pa.

"Simple Extraction:
Puncture
Incision of Capsule
Counterpuncture"

Three cataract extractions, all in the same technique. The principles are not explained. It is simply direct photography. The orientation is completely unclear because one cannot make out whether the eye is seen in normal position, upsidedown or from one side. In spite of three repetitions the details of the technique are unclear for everyone but an eye specialist who knows them. In addition to animation slow-motion could have been used. The patient is not introduced, no indications for dressing, post-operative treatment and results are shown. Needling for secondary cataract. Technique is explained in one brief title, much too rapid to understand it.

COMMENT:

The film is of a model of everything which a teaching film should not be. It has only two or three explanatory titles in the beginning which are so crowded that nothing can be retained at all. Toward the end of the film there is another title: "Irrigation of anterior chambers. Replacement of Iris."—After the manipulation has been shown already about 20 times without explanation. The film consists of about two dozen cataract extractions carried out with different methods and different instruments, all of which are not explained. What happened is that the cataract operations of a specific eye surgeon were mechanically recorded and then put together.

This does not make a teaching film. We see easy and difficult extractions, thin knives and scalpels, normal irises and an iris grown into a corneal scar. The film is a model of confusion and its only possible use would be if shown by a teacher who would explain and analyze each operation and screen it again and again. From a photographic point of view the image shows only the eye, without orientation. There are large confusing reflexes and some of the shots are out of focus. The film is a splendid example of the lack of intelligence which distinguished generally the Eastman classroom production.

CHEST DISEASES

MEMORANDUM

September 23, 1952

To: .....Feldman, M.D.
Director of ~~Health Education~~, National Tuberculosis Association

From: Adolf Nichtenhauser, M.D., Film Consultant

Subject: Production of professional teaching films on chest diseases

As suggested by you in our conversation of some weeks ago, I take pleasure in submitting to you a few considerations regarding the methodical production of professional teaching films in the field of chest diseases, and the manner in which I might cooperate to this end.

While films for the education of the lay public on the problems of tuberculosis and other respiratory diseases have been produced in considerable number over a great many years and are a recognized and successful feature of health instruction, the use of motion pictures in the professional teaching of chest diseases has been rather neglected. If one excludes the many films recording the operative performances of thoracic surgeons (which are of interest only to specialists), there are not much more than about half a dozen technical films on chest diseases in current distribution, of which only one, for nurses, has clear-cut teaching applications.

There is, on the other hand, little doubt that motion pictures could do an important instructional job in this field, as they have done in other areas of training, if produced methodically and with advanced educational and scientific film production techniques. Obviously, the purpose of such films would not be to replace lectures, laboratory work and bedside instruction but to render these more effective in those phases where the motion picture can make a definite contribution to better teaching and learning. For certain areas in chest diseases, ~~of the subject matter, some of them perhaps not too well taught~~ today, the motion picture may be uniquely suitable. To improve teaching procedures

An occasional good teaching film would certainly be useful, but the teaching of chest diseases could derive optimum benefit from motion pictures only if they were planned to cover a given area and to integrate closely with the other methods of instruction; and if they were designed and executed in such a way that no teacher would want to get along without them.

As a consultant on medical films, I should be interested in working on such a program. Although I am always willing to do the production planning for an individual film, I believe it to be more essential to approach the task in a more comprehensive way. If I were to do this, I would, subject to discussion, proceed as follows:

1. Conduct, with the aid of experienced teachers, a preliminary over-all analysis of the teaching programs in chest diseases to determine those aspects of the subject matter for which the motion picture would be a suitable medium of presentation and where, at the same time, it would be of definite help in overcoming teaching difficulties and effect savings of time and perhaps also money. It is, however, conceivable that the advantages of motion pictures may be so obvious in some areas of teaching, as to make the initial over-all survey unnecessary.

2. Select, on the basis of the above factors and plus the probability of obtaining production financing, one area of teaching for initial production consideration. Prepare the production analysis, i.e., definition of the units of the series in terms of specific teaching objectives; subject matter to be incorporated; film techniques to be used; methodological integration into the teaching process; and approximate production cost.

3. Prepare the detailed production outlines and cost estimates for the individual films; determine the production procedure; and investigate the availabilty of competent production organizations and production staffs.

In considering the question of production financing it should not be overlooked that, in the case of films representing basic teaching material, it should be possible to sell a considerable number of prints here and abroad. In the long run, even complete recovery of the production expenditure might not be entirely out of question. Nevertheless, commercial film producers would probably not invest their funds in such a project unless guaranteed a minimum number of print sales. Otherwise, recurse to financial sponsorship would be necessary, which, incidentally, has solved the problem of production financing in similar cases. The Public Health Service and the Veterans Administration have, during the past years, each supported large-scale and expensive serial production programs of medical teaching films. The Army has collaborated in this respect with the American College of Surgeons. Pharmaceutical and supply houses have occasionally sponsored the production of teaching films without a sales angle. The philantropic foundations have no definite policies in regard to the support of medical teaching film production, but all these, as well as commercial production and sale possibilities, should be explored.

MEMORANDUM

September 21, 1952

To: .....Feldman, M.D., Director of Health Education, N.T.A.
From: Adolf Nichtenhauser, M.D., Film Consultant
Subject: The Production of professional teaching films on chest diseases

As suggested by you in our conversation of a few weeks ago, I ~~am~~ take pleasure in submitting to you a few outlining in the following some considerations regarding the methodical production of professional teaching films in the field of chest diseases.

The value of motion pictures as a tool of lay education in the fight against tuberculosis and other respiratory diseases has long been recognized. As early as 1918, when the Rockefeller Foundation conducted a tuberculosis control program in France the production of a series of educational films, both documentaries and cartoons, formed an integral part of that program. Since that time, a large number of films on various aspects of the tuberculosis problem has been produced here and abroad, and their use has become an established and successful feature of health education.

By contrast, the production of technical films on chest diseases has remained scattered and inconsequential. During the past ~~xxx~~ years, only a few such films were released in this country. In 1946, the Public Health Service made a film on the procedure of mass chest X-raying, and another on routine chest ~~xx~~ X-rays upon admission to the hospital. The Veterans Administration's "Bronchiogenic Carcinoma" (1950), apart from showing an impressive operation, did not teach anything in particular, while its "Tuberculosis Nursing" (19..) provided excellent instruction. In 1950, Squibbs & Co. released an already obsolete film showing a long series of patients treated with

Streptomycin. The American Cancer Society is now planning a operative film on lung cancer. There are many films recording the performances of thoracic surgeons, but these are meaningful only to specialists in this area of surgery.

There is, in the other hand, little doubt that motion pictures could do an ~~effective~~ important instructional job if produced methodically and on the basis of advanced educational and scientific film production techniques. Obviously, the purpose of such films would not be to replace lectures, laboratory work and bedside instruction but to render these more effective by supplementing them in those ~~aspects~~ specific phases in which the motion picture can make a definite contribution to improved teaching and learning.

The advantages of certain motion-picture techniques for the study of some aspects of chest diseases are obvious. Animation can visualize normal or pathological processes in the respiratory system and, by correlating ~~them~~ these on the sound track with the signs of auscultation and percussion, facilitate the learning of basic physical diagnosis. The systematic use of cineradiography (X-ray motion pictures) could greatly improve the teaching of fluoroscopic diagnosis, for not only can cineradiographs be shown for any length of time to a group of any size, but with the aid of close-ups and superimposed outlines the finer structural detail can also be brought out far better than by demonstration on the fluoroscopic screen itself.

However, while these factors of film technique are important, they alone are too narrow a basis for the designing of successful medical teaching films. There exist different functional types of such films, as there are different types of lectures. Important here are especially two types. The orientational film

outlines, for purposes of introduction or review, a larger subject, e.g., the indications and principles of lung surgery. The instructional film proper, serving as basic study material, deals in specific detail with a circumscribed subject for the purpose of facilitating and deepening its understanding ~~af~~ or the better learning of skills; teaching films in fluoroscopic diagnosis or on the surgical approaches to the lung might be examples.

A systematic approach tp the production problem would make it advisable to analyse the teaching programs in the field of chest diseases - anatomy, physiology, pathology, epidemiology, etc. - to determine those aspects of subject matter for which the motion picture ~~medium~~ would be a suitable medium of presentation and where, at the same time, it would be of definite help in overcoming teaching difficulties and effect saving of time and perhaps also of money. On the basis of such curriculum analysis one or two specific areas would be chosen for initial production.

A ~~possibl~~ simpler and possibly more practical approach would be to select, without over-all analysis of the curriculum, one course or teaching area in which the advantages of the motion picture are obvious, and start planning for initial production. If the films proved successful both educationally and in terms of print sales, the expansion of the program might be greatly facilitated.

Naturally, in all this the question of production financing arises. It is often difficult enough to raise funds for the production of a single medical teaching film, for which reason it is obvious to ask how a more comprehensive project could be financed.

The medical film market is not yet large and safe enough to

induce ~~x~~ commercial film producers to invest ~~x~~ their money in a larger project. They might consider this only on the basis of a ~~guarank~~ guaranteed minimum sale of prints.

As to the finding of sponsorship, it is important to note that during the past years the Public Health Service has been financing two expensive serial production programs, one operated by the American Cancer Society, and the other by the National Mental Health Film Board. The Veterans Administration has financed a very expensive nine-reel series on surgical approaches to the joints, and has another series, on fracture treatment, under production. Army and Navy also have produced teaching films of wider than military interest and may be amenable to outside suggestions. It should be noted that the medical films of both VA and armed forces are primarily intended for postgraduate groups.

The same is true of the films financed by pharmaceutical companies. Moreover, ~~their~~ ~~film~~ most of their films serve basically sales promotion; sponsorship of genuine teaching films by drug houses has been infrequent, but it does occur.

The philantropic foundations have so far failed to develop definite policies in regard to sponsoring medical film production, although several have supported production programs in other areas of eductaion.

In considering the financing problem it should not be overlooked that films are used in practically all medical schools and in most teaching hospitals. In the case of basic medical teaching films it should be possible to sell a considerable number of prints here and abroad. Thus, a larger or smaller proportion of the production expenditure could be recovered, and even complete recovery is not entirely out of question.

Altogether, while no off-hand suggestions regarding the problem of production financing can be offered, the above-mentioned examples and considerations indicate that it has been solved in similar cases. However, a well-formulated and specific production plan, morally backed by a competent scientific body or agency is indispensible for the investigation of the possibilites of financing.

I should like to add that I would be available as a consultant if the Committee..... decides to pursue the matter further.

MEMORANDUM

September 25, 1952

To: Floyd M. Feldman, M.D.
Assistant Executive Secretary, American Trudeau Society

From: Adolf Nichtenhauser, M. D.
Film Consultant

Subject: Production of professional teaching films on chest diseases

As suggested by you in our conversation of some weeks age, I take pleasure in submitting to you a few considerations regarding the methodical production of professional teaching films in the field of chest diseases and the manner in which I might cooperate to this end.

While films for the education of the lay public on the problems of tuberculosis and other respiratory diseases have been produced in considerable number over a great many years and are a recognized and successful feature of health instruction, the use of motion pictures in the professional teaching of chest diseases has been rather neglected. If one excludes the many films recording the operative performances of thoracic surgeons (which are of interest only to specialists), there are not much more than about half a dozen technical films on chest diseases in current distribution of which only one, for nurses, has clear-cut teaching applications.

There is, on the other hand, little doubt that motion pictures could do an important instructional job in this field, as they have done in other areas of training, if produced methodically and with advanced educational and scientific film production techniques. Obviously, the purpose of such films would not be to replace lectures, laboratory work and bedside instruction but to render these more effective in those phases where the motion picture can make a definite contribution to better teaching and learning. In certain areas in chest diseases the motion picture may be uniquely suitable to improve teaching procedures. It would appear that the teaching of chest diseases would derive optimum benefit from motion pictures - not necessarily long and expensive ones - only if they were planned to cover methodically a given area and to integrate closely with the other methods of instruction; and if they were conceived and executed in such a way that no teacher would want to get along without them.

I should be interested in working on such a film program as a consultant. I believe it to be essential to approach the task in a comprehansive manner. If I were your consultant, I would proceed along the following lines, subject, of course, to full discussion with your Committee on Medical Education:

1. The advantages of motion pictures are probably obvious in some areas or aspects of the teaching programs in chest diseases. A few such areas should be chosen and delineated with a view to their motion picture potentialities.

2. On the basis of such delineation plus the probability of obtaining production financing, one area of teaching would be selected for initial production consideration. The production analysis would be prepared, i.e., definition of the units of the series in terms of specific teaching objectives; subject matter to be incorporated; film techniques to be uses; methodological integration into the teaching process; and approximate production cost.

3. This would be followed by the preparation of the detailed production out-

line and cost estimate for the individual films; determination of the production procedure; and investigation of the availability of competent production organizations and production staffs.

Recourse to financial sponsorship has solved the problem of production financing in similar cases. The Public Health Service and the Veterans Administration have, during the past years, each supported large-scale and expensive serial production programs of medical teaching films. The Army has collaborated in this respect with the American College of Surgeons. Pharmaceutical and supply houses have occasionally sponsored the production of teaching films without a sales angle. The philantropic foundations have no definite policies in regard to the support of medical teaching film production, but all these as well as the possibilities of commercial film production and of the role of print sales should be explored.

xxxxxxxxxxxxxxxxxxxx
xxxxxxxxxxxxxxxxx
New York Academy of Medicine Building
2 East 103rd Street
New York 29, N.Y.

September 27, 1952

Floyd M. Feldmann, M.D.
National Tuberculosis Association
1790 Broadway
New York 19, N.Y.

Dear Doctor Feldmann:

Enclosed please find the memorandum on the production of teaching films in the field of chest diseases which we discussed in our meeting of a few weeks ago.

I am sorry I could not send you this memorandum earlier. An intervening illness and the need for winding up a number of projects before leaving the Medical Audio-Visual Institute have delayed its preparation.

I hope the meeting of the Committee on Medical Education will be a success.

Sincerely yours,

AN:mhn
enc.

AMERICAN Trudeau SOCIETY

Medical Section—National Tuberculosis Association

1790 BROADWAY, NEW YORK 19, N. Y.

President
*David A. Cooper, M.D., Pa.

President-Elect
*Donald S. King, M.D., Mass.

Vice-President
*William S. Schwartz, M.D., N. C.

Secretary-Treasurer
*John D. Steele, M.D., Wis.

**Executive Committee*

Council

Hugh E. Burke, M.D., Canada
Paul H. Holinger, M.D., Ill.
Daniel E. Jenkins, M.D., Tex.
Gordon M. Meade, M.D., N. Y.
Carl Muschenheim, M.D., N. Y.
William H. Oatway, Jr., M.D., Calif.
Rufus F. Payne, M.D., Ga.
Karl H. Pfuetze, M.D., Ill.
Edward L. Ross, M.D., Canada
Paul C. Samson, M.D., Calif.
Clarence McK. Sharp, M.D., Fla.
*Sidney Shipman, M.D., Calif.
*John H. Skavlem, M.D., Ohio
John W. Trenis, M.D., D. C.
*William B. Tucker, M.D., Minn.
Norman J. Wilson, M.D., Mass.

**Executive Committee*

September 29, 1952

Dr. Adolf Nichtenhauser
New York Academy of Medicine Building
2 East 103rd Street
New York 29, New York

Dear Dr. Nichtenhauser:

Your memorandum on the production of teaching films in the field of chest diseases has just arrived and I am sure it will serve well as an introduction to this subject when our Committee on Medical Education meets on October 6. I shall pass the memorandum on to Dr. H. McLeod Riggins, chairman of the committee, for his perusal, so it may be discussed at the time it is brought up on the agenda.

After the committee meeting, I shall let you know the general tenor of the committee's discussion and any decisions it makes.

Thank you for sending us this outline.

Sincerely yours

Floyd M. Feldmann

Floyd M. Feldmann, M.D.
Acting Executive Secretary

br

cc: Dr. Riggins

AMERICAN Trudeau SOCIETY

Medical Section—National Tuberculosis Association

1790 BROADWAY, NEW YORK 19, N. Y.

President
*David A. Cooper, M.D., Pa.

President-Elect
*Donald S. King, M.D., Mass.

Vice-President
*William S. Schwartz, M.D., N. C.

Secretary-Treasurer
*John D. Steele, M.D., Wis.

**Executive Committee*

Council
Hugh E. Burke, M.D., Canada
Paul H. Holinger, M.D., Ill.
Daniel E. Jenkins, M.D., Tex.
Gordon M. Meade, M.D., N. Y.
Carl Muschenheim, M.D., N. Y.
William H. Oatway, Jr., M.D., Calif.
Rufus F. Payne, M.D., Ga.
Karl H. Pfuetze, M.D., Ill.
Edward L. Ross, M.D., Canada
Paul C. Samson, M.D., Calif.
Clarence McK. Sharp, M.D., Fla.
*Sidney Shipman, M.D., Calif.
*John H. Skavlem, M.D., Ohio
John W. Trenis, M.D., D. C.
*William B. Tucker, M.D., Minn.
Norman J. Wilson, M.D., Mass.

**Executive Committee*

November 12, 1952

Dr. Adolf Nichtenhauser
New York Academy of Medicine Building
2 East 103rd Street
New York 29, New York

Dear Dr. Nichtenhauser:

At its meeting on October 6 the Committee on Medical Education did consider the production of teaching films in the field of chest diseases but no immediate action was taken. The general feeling was that such films are too expensive for our current budget and that no production schedule should be undertaken at this time. I will keep your materials on file should any plans in this direction come up in the future.

Sincerely yours

Floyd M. Feldmann

Floyd M. Feldmann, M.D.
Acting Executive Secretary

br

cc: Dr. Riggins

SURGERY

IN

CHEST DISEASE

Wednesday, August 29, 1951

(Discussion Panel)

√ Dr. Nathan Adelman

√ Dr. George Humphreys

Dr. Richmand Moore

√ Dr. Albert Haas

Dr. N. N. Petrochko

Dr. T. S. Perrin

Dr. ~~Maynard~~ Herbert Maier

Dr. Humphreys: To whom is the film addressed? It seems to me that it is meant to interpret the patient, and what happens at a chest center. There was not much operative work. If it is meant to show the [illegible] operative work, there is too much clinical detail. Perhaps its for a local practioner to show what happens to a patient who is sent to a chest center. I don't think it teaches a surgeon anything he already doesn't know.

Question (R): How does it effect resident surgeons, surgeons in training or even general surgeons?

Dr. Humphreys: It only gives some idea of the function of a chest center, but if you worked at one you'd know anyway. From this film, you get the impression that it was the place to send a patient.

Dr. Maier: I agree. My feeling is that there is no group adequate for it. It is too detailed for one thing and too elementary for another. That is, certain things that might be all right with a medical student but others make it poor because of stressing in detail of many things not used at all in most placed, and cannot avoid criticizing from the very beginning.

Quest: (W) Would it be fit for a general medical student?

Dr. Maier: I don't think so.

Quest: (W) How about physiotherapists?

Dr. Maier: There are much better films on the same subject that are available.

Dr. Moore: I have the same opinion. I fail to see who the film is for. I cannot see very much value to the medical student because a great many important things are overlooked and elementary things stressed, that are not necessarily the most important. The rehabilitation talk is all right.

Dr. Haas There are not enough exercises shown for even physiotherapists. Only two movements are seen, breathing and arm movements. I am not enthusiastic. It is not a brand-new film.

Dr. Hum: It should be criticized as a 1943 film because of the many things that are in it and are out-dated today. But even in 1943 it leaves something to be desired. It would have been much better in color.

Dr. Maier: I think showing the film of this kind to medical students would be the same as if he saw technique used and it would make an impression on him and it would be hard to get out of his head, and there was a lot I disapprove of. That is the disadvantage of visual methods because of the danger of remembering spectacular things.

Adelman: It might, perhaps, be good for nurses because of the handling of patients.

Dr. Maier: No it would not. Some things also apply to teaching of nurses as in medical students, especially if they are alert. They have less reason for knowing whether a certain technique is good or not.

Dr. Hum: Anybody could learn something from this film, I imagine. But if you were thinking of it as a film for nurses, you would also think, "what would I do if I were going to make a film for nurses, residents, internes?", and in everyone you would leave out certain details and stress others. The film trys to shoot too wide and as a result doasn't hit anything.

Moore: All emphasis is put on diagnosis by xray and bronchoscopic examination, nothing on fistual. Too much stress on bronchoscopy as if if bronchoscopy did not confirm this diagnosis, the patient hasn't got it.

CONTENT APPRAISAL

Quest: WHAT ARE THE MOST OBJECTIONABLE FEATURES?

Dr. Maier: It seems to me they spend too much time (about 5 min.) getting started. If used for students it is hardly instructive to them. It covers a few things very lightly, just a high spot

and so few details that probably most of the things would be that which the student already knows and would not care for the details. Most students know the occasions for doing a thoracoplasty. The techniques shown are individual, dated techniques rarely used in this country for the past few years. It mentions nothing about the principals of the treatment just the method. It stress bronchoscopy which in majority of cases is negative and we operate anyway and this film shows it to be considered the determining factor. A student might get the impression that a bronchoscopy is all that would be necessary. In technique, as far as medical students are concerned, it is the principals of the surgery rather than the technique. It would be better to tell of the principal why the surgeon is doing it. Rehabilitation is more for that of a TBC patient. Cancer of the lung does not go back to the same job as before. In aiming to do so much they barely cover the highspots, of which medical students know from being around hospitals.

Question: GRANTING ALL THESE DEFECTS, CAN THIS FILM GIVE SOMETHING TO MEDICAL STUDENTS IF A RESPONSIBLE PERSON IS PRESENT AT THE SHOWING?

Dr. Maier: There are many other films on the same subject (perhaps not rehabilitation) but on diagnosis and much better anatomical visualization so since they are available would they not have, of necessity, priority?

Dr. Hum: You could teach by this film but so much would be modified that a good deal of time is wasted away. Theoretically, films should be a saving of time. The teacher would have to point out various things such as "this technique is not used anymore", etc. throughout the film.

Dr. Moore: I agree this film does not convey anything to the medical student he doesn't get in courses, contacts, etc. Regarding a statement made "requrrence of cancer after operation is rare". That is entirely false, it is very frequent.

Dr. Hum: In 1942 it was not as apparent as it is now.

Dr. Moore: Some of the best follow-ups have recurrence. The presence or absence of involved nodes is not necessarily of importance in diagnosis. You must dissect and go a long way befor that. (palpating growth at operation)

Dr. Hum: You say this was a popular film on the AMA list. Who asked for this film?

Dr. Ruhe: Requests come from various County Med. Societies, for teaching groups, medical schools,

Dr. Maier: I could see attraction to pre-med. students because of its dramatic appeal.

Dr. Hum: There is too much operative work for the lay audience.

Question: DO YOU THING G.P. WOULD FIND IT WORTHWHILE BECAUSE OF BEING SLIGHTLY OUT OF CONTACT IN MANAGEMENT OF BRONCHIOCARCINOMA, MIGHT THEY BE A GOOD AUDIENCE?

Dr. Hum: If he were unaware of screening with microfilm it is just too bad but in any case he would send his patieht to a chest center.

Dr. Maier: There is critisism in methods, sutare methods, paralysis of phrenic nerve is not done, patient is not kept in bed four weeks anymore, he is out in 2-3 days.

Dr. Haas: There is not enough shown in physiotherapy for people who do not understand. I criticize starting 4 weeks after the operation. MD might understand but physiotherapists might not.

Question: IS THE EQUIPMENT USED IN THE FILM GOOD?

Dr. Hum: Minor criticisms. It is a good historical film and in 20 years from now it would be an interesting film.

Question: ARE THERE ANY GENERAL REFERENCES TO BRONCHIOGENIC CARCINOMA THAT ARE RECENT?

Dr. Maier: A few. One is Dr. Ed. Churchill's article in A.M.A. 2 yrs. ago.

it was a up to date and had a more philasophical background and was well-balanced.

Question: THERE WAS A GOOD DEAL OF BRONCHOSCOPY, WHAT IMPRESSIONS WERE RECIEVED?

Dr. Adelman: I think it appears as a rather terrifying experience, not that its pleasant but it is much smoother than indicated. There might be some difference in the method of anesthesia, and doing it in an amphitheatre which is not really necessary. There is nothing to see, and no diagram of growth.

Dr. Hum: Some diagrams are so good that this is pathetic.

Dr. Stanley Michael
CHILD

Medical Audio-Visual Institute of the Association of American Medical Colleges

DRAFT

MENTAL HEALTH

Type of Film: Orientational; Motivational

Classification: CHILD GUIDANCE
Public Health Nursing
Psychiatry
Social Work

FACE OF YOUTH

16 mm, black-and-white, sound, 1,036 ft., 29 min.

Year of Production: 1951; Country of Origin: U.S.A.
Sponsor: Mental Health Division, Bureau of Maternal and Child Health, Wisconsin State Board of Health; Producer: University of Wisconsin, Extension Division, Bureau of Visual Instruction; Script and Direction: Herman Engel; Camera: Martin Lobdell; Musical Score: Hilmar F. Luckhardt.
Distribution: Bureau of Visual Instruction, Extension Division, University of Wisconsin, 1312 West Johnson Street, Madison 6, Wis., Sale: $90; Rental: $2 in Wisconsin, $3.50 elsewhere.

General Statement: The film urges the recognition and early treatment of emotional disturbances in children by tracing the successful efforts of a public health nurse in helping two maladjusted boys, one through family guidance, the other through psychotherapy at a mental health clinic. Weak story structure and uneven film skills limit the over-all impact of the film, and lack of credibility in the nurse's role lessens its validity in respect to mental health procedure. On the other hand, the presentation of psychotherapy should be of value in acquainting lay audiences with the work of community guidance centers.

Audience: Teachers, parents, vocational guidance classes, public health nurses.

Content Description

The film opens on close-ups of school children modeling in clay. We see their busy hands, their mobile mouths as the narrator contrasts the face of youth with that of age: "Youth has a face, a soft face, a certain roundness, not quite fixed or final. Later the lines of experience cut in deep, the features set hard in the mold." As one youngster grabs a piece of clay from another (the teacher observing without interfering) comparison is drawn between the emotional and physical lability of youth and the comparative inflexibility of adulthood. The point is made that early recognition of emotional disturbance and appropriate guidance will prevent more intractable difficulties later on. The camera now pans across a group of public health nurses at a lecture. This is one of the most important tasks of the public health nurse, continues the narrator; she sees so much, she can do so much to help children emotionally as well as physically. Attention is focussed on one of the nurses, Miss Anderson. As the lecture ends she leaves the building, exchanging greetings with neighborhood children as she passes down the street. She drives along a country road, arriving finally at the Lunmore home. She enters, dons an apron and examines the baby's rash while the mother stands by. As they are talking Mrs. Lunmore notices her older boy and a chum scrapping in the yard and rushes anxiously outdoors to intervene. As Miss Anderson observes mother and son through the window the commentator explains that the public health nurse - a welcome guest whose services are freely offered to those who need and desire them - is also concerned with such question as "why a mother should be so upset by a plain, everyday squabble between two boys."

Nurse Anderson determines to "find out a little bit more about it" and visits the school. Standing near the lockers as the children get their wraps she sees shy Ralph Lunmore trailing after his pugnacious pal, Alex, who swaggers before two shocked little girls with a toy pipe. After they have left she wanders into the empty classroom to chat with their teacher. The public health nurse and the teacher have a great deal in common, explains the commentator. "They have the same aims - to help children grow up easily and happily. This is a subtle task. It requires a gentle hand, a sharp eye..." Nurse and teacher discuss various children in relation to their drawings on the bulletin board. The narrator relates this conversation. Ralph Lunmore, who drew an airplane, isn't so happy, says the teacher, adding that Ralph never fights back, can't get angry, can't let himself go. Ralph is shown anxiously biting his fingernails, getting a stomach ache and asking to leave the room when they have spelling bees. Miss Anderson also inquires about Alex. "That's Alex!" replies the teacher, pointing significantly to the freshly carved name "ALEX" on the boy's desk. "He doesn't mean any harm," she explains. "His energy just spills over. He's pleased when the other children notice and say, 'Smart Alex!'"

Miss Anderson visits both mothers to talk to them about the boys. Alex's problem is rather easily solved. At school he becomes a member of the safety patrol squad. His father spends more time with him; the two are shown doing carpentry work on the barn. Alex's destructive exuberance is channelized into constructive activities which gain him the praise and attention he craves.

Ralph's problem is more deep-seated. The teacher permits him to call the words at a few spelling bees, but while this enables the boy

to escape his problem, it does not help him to solve it. Ralph and his mother are referred to the Child Guidance Center, where Ralph begins treatment with the psychiatrist. The clinic team - psychiatrist, social worker and psychologist - is shown and its function explained. In interviews with the social worker Mrs. Lunmore asks typical questions ("Ralph says he's heard this is a place for crazy kids...What good will it do for them - Ralph and the psychiatrist - just to play together?" etc.) and receives informative answers. In his initial treatment period, Ralph's subservient behavior is interpreted by the psychiatrist: "You always want people to think you're such a good boy." In play therapy, Ralph reveals difficulties connected with his father's frequent absence from home, as well as jealousy of the baby. He passes through a stage of overt aggression and destructiveness which disturbs his mother considerably until she talks it through with the social worker. Eventually, Ralph is able to direct his released energies into constructive activity. No longer timid and withdrawn, he is seen at the classroom blackboard, daring to copy an answer from the boy beside him, daring to grab an eraser, daring to "grow up as a boy should."

In a short final scene, the public health nurse and the teacher sit in a soda parlor together, watching with pleasure as a father buys his small boy an ice-cream cone. The narrator urges that children be helped now - "while there's time."

Appraisal

Content: "Face of Youth" deals with the recognition of emotional disturbance in children and its resolution through the cooperative effort of community agencies - the health department, the school and the child guidance clinic. In this respect the message of the film closely parallels that of "Angry Boy," without attaining the psychological

depth or factual credibility of that excellent production. In emphasis, however, "Face of Youth" stresses prevention rather than cure. Whereas "Angry Boy" traces the treatment of a child whose pathology finds expression in stealing, this film follows two boys, neither of whom engages in clearly definable antisocial behavior. Ralph is timid and withdrawn, with psychosomatic symptoms; Alex is mischievous, aggressive, somewhat destructive, but popular. Both are of normal intelligence.

The chief criticism of the film (aside from presentational vagaries, which will be discussed later) lies in the manner in which the public health nurse fulfills her role as liason agent between families requiring psychological guidance and the mental hygiene resources of the community. That the public health nurse should thus implement the Nation's mental health program goes without question. But Nurse Anderson starts the ball rolling for Ralph and Alex on the basis of such flimsy evidence - one observed incident - and pursues her course in ways so furtive and devious as to suggest the master sleuth rather than the mature professional woman. Alex pushes Ralph around, Mrs. Lunmore intervenes, while Miss Anderson peeps through the window with an "I'm-taking-this-all-in" expression. It is similar at the school. And when she finally sidles into the classroom to strike up a conversation with teacher, the teacher displays such sensitive recognition of Ralph's neurotic pattern that one cannot help but wonder why she herself has made no effort to convince the family of his need for psychiatric help. The magical - almost unethical - quality of the nurse's maneuvers is further accentuated by the absence of any detail to indicate what she does to bring Alex's father into closer companionship with the boy, or how she

persuades Ralph's mother to visit the Child Guidance Center. Mrs. Lunmore is suddenly there, talking to the social worker.

Presentation: This film is produced in documentary style, that is, it apparently uses non-actors and real settings. A good deal of labor must have gone into its planning and execution, but, unfortunately, the available film skills were apparently not in every respect up to the task. The introductory sequence of the children in clay class (contrasted with older people) has a sensitive approach which, however, is not sustained throughout. The story line itself lacks clarity, since it is not obvious at the outset that two boys from different families will be followed. Although the film is photographically competent, it contains many scenes without dramatic value, and many shots are unreasonably long or superfluous; the nurse's ride to the Lunmore family and her entrance into their home are examples of this. The acting, aside from a few scenes between Ralph and the psychiatrist, is pedestrian, as illustrated by the head-nodding of the nurse to express understanding. The sonorous and halting narration is punctuated by long silences, and the resultant disturbing effect is hardly mitigated by the excellent musical score. Furthermore, a considerable portion of this film consists of scenes of people talking to each other, with the narrator's voice communicating the content of their conversations. While this is a poor method, one gets gradually accustomed to it as the film progresses. Yet, after about twenty minutes, as the mother is seen talking to the social worker, "live dialogue" suddenly replaces the narrator's voice - for two insignificant sentences - as if everyone had sprung to life. From here on, dialogue arbitrarily alternates with narration, without apparent regard for dramatic structure. This bizarre way of using dialogue undermines,

rather than strenghens, the content value of the story.

Effectiveness: Despite its initial handicap - the ill-conceived development of the nurse's role as liason agent between family, school and mental hygiene clinic, "Face of Youth" succeeds in a number of other areas. The introductory theme - lability of youth versus rigidity of age - and its implication - preventive treatment in the formative years - are crisply posited. The advantage of informal working cooperation between school and health department is suggested in Nurse Anderson's casual talk with the boys' teacher. The situational resolution of Alex's maladjustment, while glibly achieved, nevertheless illustrates the concept of degree, when contrasted with Ralph's deeper problem. The sequence on therapy demonstrates the rationale of the clinic team approach. The mother's guidance interviews with the social worker provide a natural setting for questions and reassuring answers on psychotherapeutic procedure. Ralph's treatment sessions with the psychiatrist touch on problems of aggression, repression, oedipal attitudes and sibling rivalry. The film's recognition of the father's influence on the growing boy remains implicit, rather than explicit. Because many of these points have been made more dynamically and effectively in other films, its chief claim to distinction lies in emphasis on the role of the public health nurse in the community mental health program. While this participation is weakly conceived, the film's stress on the importance of such liason work is in itself valuable.

Utilization

The film is suitable for showing to teachers, parents, vocational guidance classes and public health nurses. A qualified psychiatrically

oriented discussion leader is needed to correct certain misconceptions which may arise concerning the responsibilities of the public health nurse and the way in which she fulfills them.

Reviewed by a Volunteer Panel at the Psychiatric Institute, College of Physicians and Surgeons, and a Panel at Teachers College, Columbia University.

March 1952.

Prepared by Marie L. Coleman.

March 5, 1952

CHILDREN

FEARS OF CHILDREN
NOTES

The film is most powerful in idea and design, but suffers from a psychologically poorly constructed story line. The main ~~point~~ of action is supposed to take place within one day, from morning to night. This is splendid for the exposition of the situational factors in the life of a family, but it is not suitable for the presentation of development.

After the factors influencing the psychological structure of the child have been splendidly represented by means of action and dialogue, what happens is that the mother has a brief conversation with a woman friend who explains to her what errors she is commiting in rearing her child. The mother, who up to now, has been anxious and non-understanding, suddenly turns into a psychoanalytically oriented expert and acts as such. She says to her husband, "You are not discipling him, you are punishing him," and she is able to interpret the child's drowning of his teddy-bear as meaning the boy's desire to kill his father; and she is also able to dispense psychological counseling to her husband. Almost as incredible is the sudden insight of the father, who is able to interpret the boy's nightmare as meaning that he is scared of himself (the father). Far more credible is the fine scene of the film in which the father recognizes intuitively what the anger of his little boy means.

As a result of the story construction, some important points are made merely by means of verbal reference. A more visually conceived film would have presented these points more graphically. For instance, instead of merely speaking of "that brand-new bear that daddy just gave you" this action could have been shown and the relationship of the boy to his toy animal be brought out with greater emphasis. Also, the ~~more~~ important point which the woman friend makes, namely, that she visited "her doctor last year" and learned from him about the nature of little boys and their behavior could have been visually presented in a story of somewhat different construction.

It cannot be estimated how far the inner weaknesses of this otherwise excellent film will affect the audiences for whom it is designed. At any rate, it may help to loosen up the attitudes by forcing them to compare themselves with the couple in the film and to be more watchful of their own relationship to their children. Whether or not the audiences will be aware, and react upon, the psychological improbability of the story, is another question. It would also seem that this film would be more useful if it gave concrete advice on where and how to get help when problems with child rearing exist.

Adolf Nichtenhauser, M.D.

CHILDREN

FEARS OF CHILDREN
(The Mental Health Film Board Series--Emotions of Every-Day Living, No. 3)

16mm, black-and-white, sound, 1,020 ft., 28 min.

Year of Production: 1951; Country of Origin: U.S.A.; Sponsor: Oklahoma State Department of Health; Psychiatric Consultants: A. A. Hellams, M.D., and Milton Senn, M.D.; Educational Consultant: Nina Ridenour; Producer: Julian Bryan, International Film Foundation; Script and Direction: Francis Thompson; Camera: Peter Glushanok.

Distribution: International Film Bureau, Inc., 6 North Michigan Ave., Chicago, Ill., Sale: $115.00. Available on loan or for rent from state or local mental health authorities, mental health societies, public libraries, and educational film libraries.

Summary: This psychologically rich film demonstrates that parents must take into account the child's developmental needs in order to help him develop sound emotional health. It presents the experiences of one little boy caught between an overprotective mother and a domineering father. The parents gradual acceptance of the boy as an individual demonstrates that well-motivated adults can follow factual advice on child rearing even though such advice may conflict with their accepted pattern of doing things based on their own emotional constellation. A psychiatrically oriented discussion leader should be present to point out depth aspects of the film which will escape less sophisticated lay audiences.

Audience: Parents and child educators, nurses, medical students, pediatricians, students of psychology, and patients in analytic group therapy.

Later the same day Mrs. Robbins and Paul are out for a walk with a neighbor, Alice Tuttle and Mike, her little boy. The children are on tricycles; as they shoot ahead Paul's mother calls him back. Mike, unrestrained, races on down the block. He abandons his bike to clamber over some rocks and Paul follows. Mike scrambles intrepidly through a miniature cave and soon reappears above, but Paul becomes terrified in the dark and screams for his mother. Mrs. Robbins and her friend stand at the entrance and Paul's mother calls him back. As he emerges, sobbing, she notices that he has lost a mitten and tells him to go back inside to get it--"Daddy will be angry." The other mother intervenes. "Don't send him back in there, Helen, he's too frightened." Back at the Tuttle home over a cup of coffee, Paul's mother complains about his sulky behavior and his incomprehensible fears. Her friend explains that they had similar difficulties with Mike only a year ago, but their doctor helped them to understand that it is natural for little boys to become angry, and wise to allow them to express it.

That evening Mr. Robbins dries Paul after his bath. As he leaves the bathroom he trips and cracks his shin to avoid stepping on Paul's turtle. Furious, he kicks the turtle across the floor. "Daddy, you kicked George!" the shocked boy calls after his father. When his mother comes in she finds him drowning his teddy bear in the washbowl. "He's not made for that, dear," she protests. "Oh, Paul, it's the brand new bear that Daddy just bought you! I'm glad he didn't see this!"--and she thrusts the soggy victim behind the shower curtain. "Daddy kicked George," the child responds solemnly.

Mr. Robbins, cheerful again, puts his son to bed. Paul asks him not to turn out the light, but his father reassures him that he is perfectly safe. "Please, Daddy, leave the light," Paul begs anxiously,

but his father turns it off and goes downstairs. Paul calls for a drink of water, but the father does not allow the mother to go upstairs, even though she points out that Paul may be upset over the cave incident. He protests that she is coddling him, declares that this will only encourage Paul to do the same thing again and again. Silence falls upstairs. Presumably Paul is asleep. But even as Mrs. Robbins starts upstairs to see if everything is all right, he begins to scream. He has had a nightmare about the cave: as he peered inside, a shadow fell over the entrance--he turned to find a huge bear towering over him, and he screamed in terror. Both parents rush in to comfort him, but Paul sobs afresh at the sight of his father and burrows deeper in his mother's arms. "Why, he's scared of me!" the father exclaims, amazed. "Why don't you let me stay with him for a minute?" pleads the mother, and Paul's chastened father goes.

After Paul is asleep again his parents talk. Mrs. Robbins admits that she babies Paul, but--"I honestly think that you've been pushing him too hard," she tells her husband and speaks of Helen Tuttle's advice. "What do you do when he sulks?" protests the father. "Aren't supposed to let him go hog-wild?" His wife finally produces the dripping teddy bear. "Here you are, darling," she remarks wryly. The father recognizes that Paul has taken out, on the toy, the wrath he felt toward himself. "By golly," he says, impressed--"the Old Man better watch his step!" Both parents determine to modify their habitual attitudes toward Paul.

In a final scene Paul's father romps with him near the rocks where the boy had been frightened. Mr. Robbins tries to persuade the boy to enter the cave, but Paul refuses. He begins to insist, but remembers to be lenient. "O.K.," he says, hoisting the little boy to his shoulder and turning his back on the cave, "Where do you want to go?" Paul points--"Over there," and father and son climb cheerfully to the top of the hill.

Appraisal

Content: This production is one of a small group of mental health films which convey their message at multiple levels of understanding. The story itself is fairly simple: During the course of one day a little boy lives through a number of trying situations in which he is caught between the mother's overprotectiveness and the father's demand that he conform to adult standards. He reacts with timidity, stubbornness and displaced hostility. His mother expresses concern over this symptomatic behavior to a neighbor and the latter passes on psychological advice which she once received from her family doctor under similar circumstances. After some resistance both parents determine to modify their unrealistic attitudes and the boy responds favorably.

Great care has been taken to develop this theme dynamically, so that unconscious as well as conscious mental processes stand revealed on the gestural, verbal and symbolic levels. For example, we see little Paul's wish to hold his mother's attention in the gesture he makes to cut off his pajama button while the mother sews a button on the father's shirt. We detect the reactive nature of the father's

intolerance toward Paul's sulking in his verbalization: "That's the one thing I can't stand--the one thing my father wouldn't tolerate!" Symbolic equivalence is demonstrated in Paul's attack on the teddy bear when he cannot retaliate against his father and the nightmare in which the father is represented as a huge and menacing bear.

With clarity and simplicity the film also shows how neurotic tendencies may be augmented, and find justification, in personal interaction. The father's severity toward Paul drives the mother to further excesses of overprotectiveness and permit her to rationalize her tendency to infantilize the boy. The mother's attitude--"He's only a baby,"--increases the father's anxiety lest Paul fail to develop necessary qualities of fortitude and responsibility and provokes him to even greater demands on the child.

In all of the above respects, the presentation is in full accord with sound psychiatric principles.

Less valid, however, is the "conversion" scene after Paul's nightmare, in which the parents not only accept the neighbor's truths about the normality of aggression in little boys and the need to express it, but spontaneously understand the meaning of Paul's drowning of the bear ("By golly, the Old Man better watch his step!"). Conservative psychiatric opinion may also take issue with the implicit message that child-rearing attitudes can be changed through conscious effort alone, although it is

R.I.85 "OUR CHILDREN", Photographed by James Goebel, written and directed by Carlyle Ellis, "The Children's Bureau held a children's health conference in Gasden, Alabama, and this film was made at the tiie. The characters and eventsare real." A Children's Year Poster.

Reel 1:

Nine hundred thousand babies under five are lost annually, of which one-half die needlessly. The Children's Bureau and Womens' Committee of the Couhcil of National Defense started Children's Year to prevent these deaths.

Two women on doorstep reading a newspaper in which they find an appeal by the Government to weigh and measure babies. A woman on a porch measures her baby. A horse-drawn ice truck arrives and the woman steps down to the street and weighs the baby on the scales of the truck, but this scale shows 50 lbs. The two women with the baby go to the grocers. A grocer pushes the scales out on the sidewalk. Several children are weighed with various little incidents. However, one older woman declares that the scale is not good enough and she would write to the Children's Bureau for advice and her Womens' Club would help. A woman doctor in the Children's Bureau is seen answering the letter. The Womens' Club receives several publications from CHB which are discussed in a meeting held on a porch. The women move to do something about the high infant death rate. A woman doctor from CHB and a nurse have arrived and unpack their trunks in a room furnished by the Club. White and colored mothers with infants and little children arrive. The interior of the clinic. The waiting mothers and children, LS and CU. (Something missing?) School children lined up at the clinic. The doctor examines them. Looks at their tonsils while the nurse takes notes. Very superficial examination. CU of boy scratching his leg with the other foot. Tooth brush drill with many children. The doctor standing behind a table demonstrates some simple exercises which the children repeat. The colored clinic, in a

rather shabby room. A waiting line. The Negro mothers making their infants ready for examination. The nurse prepares an infant for examination. Two little girls smiling. A business men's meeting at which the CHB doctor talks. Title: "With this backing a progressive mayor and council provide a public health nurse for all the year around." A meeting of the City Council. The public health nurse on her rounds in the Negro section, talking to children in the street, entering a house. The news of the ChB conference has spread to outlying farms. A truck full of healthy children. A sign on a tree reading "Gasden one mile, safe for babies." A map of the U.S. with a legend "Make the whole country safe for babies."

The public health nurse is looking for quarters where she can be easily accessible. She sets up a Children's Health Centre. A group of children exercise in the woods, dance and jump.

Reel 2:

Doctor in clinic examining white infant. Examination of head, chest organs, abdomen. The nurse is testing ~~xxx~~ sight on Snellen chart. Hearing is tested. Title: "Local physicians have volunteered certain hours each week for the regular Children's Clinic." The nurse instructs teen-age girls on the care of babies, showing a baby being bathed, preparing of baby's food. A field day of the community in a park with dances and exercises by the children. Waiting line in white clinic. The women study the wall posters and cards. The nurse weighs a baby. Models ~~xxx~~ of baby equipment are exhibited. A baby is accurately measured. The doctor examines a normal 6-month's baby. Another baby of the same age artificially fed and weighing far less. A father with a baby appears in the waiting line. The Womens' Club makes a house to house canvass in order to establish adequate birth records. On the basis of the data found they appeal to the ChB for a Child Health Conference.

Anurse measuring a little child on scales.

COMMENTS:

Film shows a great sense for audience appeal. Without trying to be cute the actions and reactions of the children are very well caught by the camera. Very natural without any posing, for instance, the tooth brush drill which consists of long shots, CU's and medium shots. However, the examination of the children is very superficial, consisting only in inspection of the head and tonsils.

This film is actually documentary. There is clever photographic handling of interiors, such as the business men's meeting.

A good propoganda film. It is superficial from the medical point of view. It does not show clearly what the actual results were in this community in terms of improvement of child health, and how this improvement was achieved; this is probably due to the fact that the film was made while the Child Health Conference took place. What the film seems to recommend is that an examination of the children be made and a public health nurse employed.

CIRCULATION (1929)

The first diagram is confusing, looking like a network and not bringing out the structure and flow of the blood. The business with the white and black dots, the chicken embryo circulation, is confusing because one cannot follow a great number of dots at the same time.

Arteries, capillaries and veins in the chicken are shown but the difference in size and function not brought out. A heart model with cut-off vessels. Every part is labeled but it makes no sense since form and functions of the vessels has not been explained previously and cannot be brought into relation with the heart. This is followed by a naturalistic drawing of the heart which is successively sectioned in a diagram. This is not much clearer than the model, apart from showing the four chambers of the heart. All this material is quite static and can be taught better with the help of good illustrations. A beating, isolated frog heart is shown, but it is not stated that it is taken in slow motion. The pulmonary circulation in diagram very unclear. Alveolar circulation is shown in successive, enlarged diagrams, the last one showing a completely unclear epithelial cell with capillaries. Again, successive, enlarged diagrams show a capillary between muscle fibers although the number of diagrams is in no relation to the simplicity of what is being shown. Again the confusing business with black and white dots

to illustrate the exchange of O_2 and CO_2 and food and waste. The speed of the blood is quite different in the microscopic shots and in the diagrams, but this difference is never explained. The return of the blood through the veins is again unclear. The presentation of the lymphatic system is again quite unclear, and appears as if it were a network rising up from the feet to the neck. The statement that the lymph carries digested food is incorrect.

A mistake of the film is to tear apart what belongs together. Instead of giving first a clear, simple, diagramatic presentation of the circulatory system, it shows only details which cannot be understood because the understanding for the total structure and flow is missing. The diagramatic and animated details are very poorly visualized and confusing by themselves. The 1918 films by Bray on the heart and on breathing are vastly superior in clarity to this film.

Illustrations: The first diagram of man.
Diagram of chicken with dots.
Alveoli.
Heart model.

CIRCULATION (1929) (Supplementary Note)

Course of blood. Ascending from the feet up.

Chicken embryo circulation. Apart from being visually unclear, it is incomprehensible for students because the principles of placenta circulation have not been explained. Instead of clarifying human circulation, it makes it even more confused. Arteries under microscope are from chicken embryo but it is not stated. The same is true of capillaries and small veins. Again a shot of the whole embryo but its form and the pulsating organ in front are not explained.

By starting out with a model and then with a naturalistic drawing of the heart with all large vessels and naming these vessels, the film uses exactly the opposite approach from that desired, namely from the complicated to the simple. A diagram of the sectioned heart is again too realistic, showing all the trabecles and therefore not giving a clear concept of the four chambers. Again, on the drawing of the heart the names of the vessels are labeled. Only after showing a frog heart follows a simplified, animated diagram of the heart beat which, however, is so poorly organized that it can hardly be understood. The animation of alveoli and capillaries does not explain what they do. In the body circulation again a micro shot of an embryonic artery is shown as if it were a human one. In the animation of capillaries in muscles, suddenly the term "lymph capillary" appears although the concept of the lymph system has not been touched in the film before.

In the diagram of lymph flow, the superficial and deep vessels are shown filling at the same time.

CIRCULATORY CONTROL (1930)

Chicken embryo?

Demonstration of arterial elasticity in a rubber tube through which water is driven from a bulb. However, the water flows out in a steady stream, sometimes stronger, sometimes weaker; while from the rigid tube it flows out in squirts. Title: "Demonstration: Elastic tubes (like arteries) absorb unevenness of flow. Rigid tubes do not." This is perfectly true but the demonstration does not parallel the actual behavior of arteries and veins. Title: "The pressure of the blood in the arteries can be measured" - but it is not explained what blood pressure is. An extremely long sequence vainly tries to explain the principle of blood pressure measurement by diagram and LA, first showing a mercury instrument and then with a manometer.

Demonstration of superficial veins, stopping the flow by by pressure which is not explained. When micro shots of embryonic veins are shown, again no indication as to difference in rate of flow. A lengthy sequence shows a beef vein being filled with water which does not flow out because of the valves. The vein is turned inside out and the valves are filled with water. Then it is turned right side out and demonstrated again. It is now cut open and the valves again demonstrated. A diagram then shows blood flowing from the bottom to the top, stopping, and the valves closing. However, why the valves are necessary and when they function in the blood flow is not explained. Then an experiment is shown on the arm which is unclear.

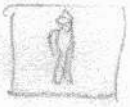
Vasomotor Control: A long-drawn-out sequence shows one ring each put on one finger of the left and right hand, one hand immersed in hot water, the finger swelling, and the ring sticking to it; the other hand immersed in ice water, and the ring cannot be pulled off the finger. A photograph with overlaid animation shows unexplained impulses running from the brain. The parts of the instrument are shown but its principle is not explained, especially it is not shown that water is being filled in and communicates from the calibrated tube to the glass cylinder in which the hand is.

The two ring experiment - the diagram shows only the principle of the cold effect and not that of the heat. It is not explained that the running dots represent the irritation of the sensory nerve transmitted by the brain to the vascular nerve and resulting in constriction of the vessel. Also the reduction in size of the vessel is so indistinct as to be of no value.

Then an experiment is shown in which it is demonstrated that the volume of the hand increases during sleep and vice versa, due to filling of the surface blood vessels which is not explained in a title. The technique of the experiment itself is not quite clear. The calibrated tube in which the water is measured is shown at tremendous length in the film, but the principle of the arrangement is unclear. Finally, a title states that body temperature is constant in heat or cold, with shots of men shoveling in the heat and a man with sled dogs in an arctic atmosphere.

The biological function of the enlargement of surface vessels and vice versa is not explained.

CIRCULATION (1929)



The first diagram is confusing, looking like a network and not bringing out the structure and flow of the blood. The business with the white and black dots, the chicken embryo circulation, is confusing because one cannot follow a great number of dots at the same time.

Arteries, capillaries and veins in the chicken are shown but the difference in size and function not brought out. A heart model with cut-off vessels. Every part is labeled but it makes no sense since form and functions of the vessels ~~has~~ have not been explained previously and cannot be brought into relation with the heart. This is followed by a naturalistic drawing of the heart which is successively sectioned in a diagram. This is not much clearer than the model, apart from showing the four chambers of the heart. All this material is quite static and can be taught better with the help of good illustrations. A beating, isolated frog heart is shown, but it is not stated that it is taken in slow motion. The pulmonary circulation in diagram very unclear. Alveolar circulation is shown in successive, enlarged diagrams, the last one showing a completely unclear epithelial cell with capillaries. Again, successive, enlarged diagrams show a capillary between muscle fibers although the number of diagrams is in no relation to the simplicity of what is being shown. Again the confusing business with black and white dots

to illustrate the exchange of O_2 and CO_2 and food and waste. The speed of the blood is quite different in the microscopic shots and in the diagrams, but this difference is never explained. The return of the blood through the veins is again unclear. The presentation of the lymphatic system is again quite unclear, and appears as if it were a network rising up from the feet to the neck. The statement that the lymph carries digested food is incorrect.

A mistake of the film is to tear apart what belongs together. Instead of giving first a clear, simple, diagramatic presentation of the circulatory system, it shows only details which cannot be understood because the understanding for the total structure and flow is missing. The diagramatic and animated details are very poorly visualized and confusing by themselves. The 1918 films by Bray on the heart and on breathing are vastly superior in clarity to this film.

Illustrations: The first diagram of man.
Diagram of chicken with dots.
Alveoli.
Heart model.

CIRCULATION (1929) (Supplementary Note)

Course of blood. Ascending from the feet up.

Chicken embryo circulation. Apart from being visually unclear, it is incomprehensible for students because the principles of placenta circulation have not been explained. Instead of clarifying human circulation, it makes it even more confused. Arteries under microscope are from chicken embryo but it is not stated. The same is true of capillaries and small veins. Again a shot of the whole embryo but its form and the pulsating organ in front are not explained.

By starting out with a model and then with a naturalistic drawing of the heart with all large vessels and naming these vessels, the film uses exactly the opposite approach from that desired, namely from the complicated to the simple. The diagram of the sectioned heart is again too realistic, showing all the trabecles and therefore not giving a clear concept of the four chambers. Again, on the drawing of the heart the names of the vessels are labeled. Only after showing a frog heart follows a simplified, animated diagram of the heart beat which, however, is so poorly organized that it can hardly be understood. The animation of alveoli and capillaries does not explain what they do. In the body circulation again a micro shot of an embryonic artery is shown as if it were a human one. In the animation of capillaries in muscles, suddenly the term "lymph capillary" appears although the concept of the lymph system has not been touched in the film before.

In the diagram of lymph flow, the superficial and deep vessels are shown filling at the same time.

CLEANLINESS

CLEANLINESS - KEEPING THE HAIR CLEAN

Health -- Hair washing, care of brush and comb -- The washing procedures -- Instruction of children.

A dull and slow film without explanations and motivation. Washing equipment shown may not be available everywhere.

December 23, 1942

CLEANLINESS - CLEAN FACE AND HANDS

Health -- Hand washing at home and at school; face washing -- The washing procedures -- Instruction of children.

A slow and dull presentation without explanations and motivation. Some procedures are unclear despite the slowness of the film. Part of the washing equipment is too elaborate. The nail cleaner used by the girl is dangerous. The inspection method applied by the school teacher may help to spread disease.

CONSULTANTS: Doctors Myron Wegman, Eva Lansberg, Irwin Ross and Ruth Rothmayer, R.N.

December 23, 1942

CLINICAL CONGRESS

Medical Films, USA, 1929

Clinical Congress of American College of Surgeons, Bulletin of the ACS, 13:5, 1929.

The following films produced by the ACS were to be shown at the 19th Clinical Congress in Chicago October 1929:

The Diagnosis and Treatment of Infections of the Hand
Intestinal Peristalsis
Blood Transfusion
Prostatic Hypertrophy
Inguinal Hernia
Simple Goiter
Acute Appendicitis
Breech Presentation
Rabies
Ectopic Heart
Amyotonia Congenita
The Normal Heart
Test of Vestibular Function

In addition some of the films "thought to have unusul interest and merit" were to be shown. "What is probably the first general exhibition of such films in this country (color films) will be made at the meeting this year."

June 21, 1944

COLLOIDS IN MEDICINE: produced apparently before 1940; 20 minutes; sound; black and white; sponsored by Crooke's Laboratories; produced by Merton Park Studios Production; director, M. F. Cooper.

Film begins with historical reminiscence showing Graham in his laboratory explaining to visitor the difference between crystalloid and colloidal substances. Then the properties of colloidal solutions are explained. The Tyndall beam is shown and the examination of a solution with the ultra-microscope. Brownian movement. The preparation of colloids: dispersion method developed in 1881 whereby two electrodes under water are employed. The chemical method of preparation is explained by dividing the weight of the universe by one million until weight of a colloidal particle is reached. Explanation of electrical charge of colloids.-- Application of colloids in medicine is shown in the testing of cerebrospinal fluid with colloidal gold and the application of a gum solution for transfusion.-- Sequence follows showing the products of Crooke, ampules, bottles and other packages.

The film doesn't live up to its title, doesn't show enough about application of colloids in medicine. Essentially it is a film on physical chemistry. In addition, the last sequence and the frequent mention of the sponsor render it a sales promotion film.

The presentation is not first-class. It is largely verbalized with the commentary spoken at a rapid speed. There is very little animation although the explanation of colloidal tructure and properties would be an excellent subject for animation. (Incidentally, the cube which is used demonstrating division of surface is larger then 1cc. as pretended).

If the film is acceptable at all, it may have to be revised in this country. All the sales promotion stuff should be removed. Of the remainder it is a question whether a version limited to the physical chemistry alone might not be better than one including the very sketchy medical application.

an;fg

Subject Classification: COMMUNICABLE DISEASES

TECHNIQUES OF GROUP CHEST X-RAYS SERVICES (1946)

16mm, sound, black-and-white, 18 minutes
Type of Sound: Narration, one dialogue scene
Producer: U. S. Office of Education for U. S. Public Health Service
Distributor: Castle Films, 30 Rockefeller Plaza, New York 20, New York

Content:

Successful operation of group chest x-ray services requires the cooperation of local and State departments of public health, local health and tuberculosis associations, public health nurses, industrial physicians and nurses, x-ray physicians and technicians. The mass x-ray is done best through some large community center and the essential procedures are the same whether done in a factory, school or some other center. A preliminary conference is held with representatives from employees, management, local health departments and plant or local physician, public health nurses and the sponsoring committee. In this meeting questions are answered, processes explained and objections considered. It is explained that the x-ray reports go direct to the examinee at his own home and are held in strictest confidence. Centrally located room usually selected by physician in charge of the unit. Some requirements: at least 18' x 20', preferably with two doors, one for entrance, one for exit, to keep traffic flowing smoothly. A place by window where x-rays may go out of the building. Light proof place, such as a closet, for developing films. 205-245 AC current necessary. Sponsoring committee carries on publicity. The equipment is transported on truck. Every piece of equipment has its own place so any empty space indicates missing part of equipment. It is unloaded in order for setting up. Light proof hood equipped with grid. Complete darkness or safe-light necessary to handle film. Competent team can have room ready in an hour. Lead screens must be used to protect from radiation. Test run on equipment. Technicians never use themselves for test runs because of the constant exposure to x-rays. Disrobing is no longer necessary in mass radiography. This system uses miniature film, camera photographs the resulting fluoroscopic image on the screen on small film. Card filled out when each person enters the room, photographed directly on the film in place of the usual lead numbers. Posters around the room answer many questions. 12 adults in every thousand found to have reinfection of TB. With the methods shown here 400-600 can be x-rayed in a working day. Films developed at end of each day, to be reviewed by M.D. in charge of project next day. 100,000 films filed in one cabinet. Form letters sent out if check-up required. With a few adjustments the equipment can be readjusted to make large pictures necessary for check-up. All suspect cases given personal interview, listed for follow-up by local health department. Statistical report the final job.

Comment:

This is a technical film intended for physicians, x-ray technicians, public health nurses, community leaders, management and labor. It presupposes the knowledge of the need for chest x-ray surveys; it is therefore not a propaganda film. What the film does is to give a generally clear and understandable picture of the involved procedure of organizing a mass x-ray survey and of the technical requirements and conduct of the operation. The techniques shown are modern and up-to-date. Important in this respect are three points:

the mobility of the equipment by use of a truck; the method of photographing the fluoroscopic picture on miniature film; the possibility of x-raying without the need for undressing the chest. From an international standpoint the film seems to be important because the method is applicable everywhere, provided equipment and personnel is available.

Audience Suitability:

See above.

Recommendation:

This film should be submitted to the Division for International Health Relations, USPHS, to consider its international applicability. If it is desired to use this film at all the question of language versions should be considered.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 4/9/47

Subject Classification: COMMUNICABLE DISEASES

SANDFLY CONTROL (1946)

16mm, sound, color, 35 minutes
Producer and Distributor: War Department

Comment:

The first part of the film shows the various types of diseases transmitted by the sandfly. In Patacci fever there is no indication how the parasite is transmitted by the sandfly. Throughout the presentation of the various diseases there is on the whole very little indication of the pathology. The picture concentrates on symptomatology and geographical distribution of the diseases. With the exception of the Veruga Peruana it is hardly possible for the non-specialist to differentiate between the various types of cutaneous and subcutaneous diseases. The distribution of the diseases is indicated by travelogue-like shots from the location in question while the narration gives the name of the location. Since quite a number of diseases are dealt with it is generally very difficult to retain this information. On the whole it can be said that this part of the film is poorly organized because (1) it does not give a sufficient visualization of the pathology and course of each condition, (2) the symptoms are not filmed in enough detail for analysis and differentiation. Altogether this part does no more than illustrate in a rather superficial way the occurrence and appearance of the conditions transmitted by the sandfly. In the part on sandfly control it is not indicated what type of survey and planning has to be done prior to outside DDT spraying. The technique of spraying itself is not shown in a detailed way. The amount of information in this film is too large for easy assimilation and appears crowded. The best the film can do is to give an initial survey on this group of diseases.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 5/26/47

Subject Classification: CYTOLOGY

DIVIDING CANCER CELLS IN VITRO* (1941)

16mm, 35mm, silent, black-and-white, 5 minutes
Author and Producer: Dr. Warren H. Lewis
Distributor: Wistar Institute, Philadelphia

Content:

Shows a number of mitotic divisions of cells in tissue cultures grown from tissue taken from malignant tumors. It also shows several triploid divisions.

Comment:

Like other films by the same author this one too shows in exquisite clarity and magnification fundamental cell processes which could not have been visualized in any other way. Yet in this film too there is no interpretation of the visible action which would be essential for understanding by non-specialist audiences.

Audience Suitability:

All medical and biological audiences on all levels of training.

Recommendation:

Suitable. Submission to subject matter specialists appears unnecessary. If accepted the author should be requested to furnish a manuscript to go with the film.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 3/19/47

*This film is mounted on a reel with Dividing Normal Adult Rat Fibroblasts in Vitro

Medical Film Institute of the Association of American Medical Colleges

MEDICINE

Type of Film: Instructional

Classification: COMMUNICABLE DISEASES
Virology
Smallpox

SMALLPOX AND VACCINATION

16mm, color, sound, 1008 ft., 28 min.

Year of Production: 1939 (revised); Country of Origin: U.S.A.
Producer: New York State Department of Health; Technical Adviser: Ernest L. Stebbins, M.D.; Camera: Leon A. Kreger
Distribution: New York State Department of Health, 18 Dove Street, Albany 6, N.Y., Sale: At cost, on application; Loan: In New York State. (Loan applications from outside New York State should be made via the respective State Health Departments.)

General Statement: This film deals mainly with the appearance and distribution of smallpox lesions, with special reference to the mild and atypical cases seen in the United States. Differential diagnosis with chickenpox, the modifying effects of vaccinia and two methods of vaccination are also considered. Although inadequately produced and poorly organized, the film is of value for learning the recognition of the disease, particularly if presented as an integral part of the classroom teaching on smallpox.

Audience: Physicians; medical students; public health personnel; nurses.

Content Description

A title states that recent outbreaks of smallpox (in New York State) have shown very mild and confusing signs and symptoms, which nonetheless present valid diagnostic criteria. Five cases from a family outbreak demonstrate the diversity of appearance of the lesions and their relative uniformity of distribution. A severe case from another outbreak presents a good illustration of distribution of the eruptions; a mild case with few but typical lesions from the same small epidemic provides a contrast. Five varied cases from a localized epidemic in a mental hospital present a range of clinical manifestations, two with the "Buddha" distribution of pustules. A title indicates that variola is modified by prior or concurrent vaccinia; two cases with few and scattered but typical pustules show the effect of vaccination. A title makes clear the need for differential diagnosis with varicella, chickenpox; three cases, one of great severity, illustrate this contrast. A malignant and severely toxic case with a generalized rash of hemorrhagic, confluent pustules is shown. Titles give the diagnostic points to be considered in suspected smallpox, along with warnings regarding "chickenpox" in the unvaccinated adult. Consultation with specialists and isolation of suspicious cases is recommended.

Vaccination is discussed, and the multiple pressure method is demonstrated. The single scratch method of vaccination is demonstrated on two patients. The immune reactions of four patients are briefly shown preceding a brief concluding title.

Appraisal

Content: The film seeks to demonstrate the difficulties in the diagnosis of mild forms of smallpox cases which do not manifest classic diagnostic criteria. It also contains a sketchy section on the methods of active immunization by multiple pressure and single scratch vaccination. The case records are highly

illustrative of the range and distribution of lesions in this now infrequently seen disease. The film is limited to an examination of the distribution of the superficial lesions, and is only concerned in a minor and verbal way with the identifying details of the lesions, the classic distribution of the lesions and the full picture of the total smallpox syndrome. Therefore, the film can assist in the recognition of the disease, but hardly in its scientific understanding. The performance of the vaccination techniques is not impressive; it lacks the precision and deftness which would be desirable in a model demonstration. Moreover, the single-scratch technique is now obsolete.

Presentation: The film, originally produced in silent form and later revised and provided with a sound track, consists of a series of more or less static case records, followed by an inadequately presented sequence on vaccination techniques. The range of possible lesions is not methodically developed, either from mild to severe, or the reverse. The visual approach fails to make unforgettable the recognition of the total syndrome, a lack which is not remedied by mention of much specific detail in the narration. Photographically, the clinical footage is fair, but there is little thoughtful analysis by the camera of the nature and distribution of the lesions in the cases shown. Indeed, there is hardly an adequate close-up in the film, and one never clearly sees either the vesicle, the pustule, or the hemorrhagic base of the pustule. Similarly, the essential details of vaccination technique and of its results are difficult to distinguish because of the absence of close-ups. In addition, the handicaps of shooting in the field and the lack of competent direction are seen in the inadequate lighting, the distracting backgrounds (as in the homes and institution) and in the problems of filming modest female patients. More expert editing could have improved the film, although the slow pace and repetitions are not amiss. The narration might well have been less verbose.

Although visually annoying because of their pink backgrounds, the titles are well timed and worded, and provide a useful and instructive supplement to the narration.

Effectiveness: The film is of very high interest, despite its serious shortcomings of presentation. The recognition of smallpox is of great importance to every physician; and a motion picture is an excellent means to teach identification of this fortunately rare disease. The dramatic nature of the lesions is certain to hold the interest of physicians. Enough clinical material is demonstrated in this film to drive home the variability of the eruptions and of their distribution. However, the film is in no sense analytic of the smallpox syndrome, and may even confuse the orientation of the student if not carefully used. Because of its poor presentation, the vaccination sequence may not even be of value as a review.

Utilization

As long as no better film is produced, the clinical cases demonstrated in Smallpox and Vaccination will be most useful in the teaching of the subject. Lectures and reading should both precede and follow the screening, in order to assure recognition of details of lesser clarity and to correlate the material in the film to the total picture of the disease.

December 1950

Reviewed by New York State Medical Society and Medical Film Institute Panels

Copyright 1951 by Medical Film Institute of the Association of American Medical Colleges

Subject Classification: COMMUNICABLE DISEASES--PREVENTION

TSUTSUGAMUSHI PREVENTION (1945)

16mm, sound, black-and-white, 29 minutes
Type of Sound Track: Straight commentary and dialog
Producer and Distributor: Navy Department

Content:

Film opens with pilots being briefed on the softening up of a Jap-held island prior to invasion. On planes' return, pictures they took of terrain studied, and invasion planned through grassy low-lying land along river. Marines infiltrate through this tall grass. Battle casualties from invasion are light, but soon men are brought in from jungle with terrific headache and fever. It looked like malaria but blood smears were negative. First clue were eschars--black buboes. On 5th day spotty rash appeared. It was scrub typhus, also known as mite typhus, Japanese river fever and many other names. Tsutsugamushi in Japanese means "dangerous bug." Headache and prostration are intense. Racking cough, low pulse rate at first, fever of 103-4. Patient gets sicker. Pulmonary congestion develops. Cyanosis and more rapid pulse. Edema prominent. Blood test positive. Patient has great trouble resting and bad dreams get worse, in some cases amounting to delirium. There are no vaccines, drugs and sera for this disease. Treatment can only be supportive. High caloric diet, soft and frequent. Most cases pulled through all right between 16th and 20th day. Temperature dropped to normal after series of drenching sweats, pulse, heart and respiration return to normal. Patient is wasted after edema subsides. Convalescence takes 1-3 months. There are no aftereffects. 1200 cases on this island, 138 died. Some places have lower mortality rate: 5 out of 100, while others run to 10, 15, or 20 out of 100. In Japan the mortality may run as high as 40%. In the planning for invasion of another Jap-held island the aerial reconnaisance photos suggest suspicious topography to lecturing medical officer. He points out the type of grass fields harboring rats, other rodents and mites. He describes these mites, tiny red things which carry rickettsiae. Adult female shown in animation laying egg, life cycle of result follows. Chigger has only 6 legs. Needs a blood meal in order to develop. Usually inserts its proboscis at a hair follicle, injects saliva, takes in blood. Animal shown was infected with rickettsiae. Does not affect chigger which drops off, forms chrysalis, nymph, goes underground, emerges as adult and vegetarian and harmless to man but carries organism passed on to offspring which, with salivary injection, goes into victim of the chigger's bite. The rickettsiae continue to be passed on to succeeding generations in geometric progression. Rodents and birds in these areas keep the rickettsiae alive. Only solution is insect repellant and impregnation of clothing. Everything to be used in landing is treated, especially socks, since chiggers hit feet first. Impregnation material prepared under the direction of a Medical Officer. Thorough mixing important. All clothing

must be dry to keep the mixture from diluting and insure adequate impregnation. As dimethyl pyrate irritates scrotum slightly shorts are not treated. Every garment marked to show it has been treated. Effects of treatment last 1 month, still effective after 15 minutes in fresh water or 30 in the ocean. Men in this invasion apply repellant to exposed areas. Camp site checked by commanding officer and medical officer. Any vegetation cleaned away by bulldozer. All scrub burned so that rats and chiggers will have no hiding place. Powdered sulphur sprinkled on cleared areas. Living quarters are decked. Nothing left exposed where rats could get at it. Men not allowed to take any chances. There were a few cases among those who were a little careless. Extra precautions did not interfere with regular activities. Impregnation symbol shown.

Comment:

Although dealing with a subject of preventive medicine the film is rather an orientation or indoctrination film than a scientific one. The story is highly melodramatic and makes ample use of hackneyed devices such as the profuse and obtrusive musical accompaniment or the lecturing medical officer. There are perhaps too many words and not enough pictures in the film. From a clinical standpoint the film is not quite sufficient. As a matter of fact some of the symptoms are only described in words, with rich musical background, but they are not shown. The application of the film is not quite clear. It seemed that it was designed for all personnel engaged in invasion operations in the Pacific although for this purpose it may have too much scientific detail. It is not suitable as a film for medical audiences.

Recommendation:

Not suitable.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 2/14/47

Medical Film Institute of the Association of American Medical Colleges

MEDICINE

Type of Film: Orientational

Classification: COMMUNICABLE DISEASE
Public Health
Epidemiology
Bacteriology
Sanitation

PLAGUE CONTROL (Navy Code No. MN-4049)

16mm, color, sound, approx. 900 ft., 25 min.

Year of Production: 1944/45; Year of Release: 1945; Country of Origin: U.S.A.
Producer: U.S. Navy, in collaboration with Pathescope Company of America, Inc.
Distribution: Sale: $96.19, Castle Films, 1445 Park Avenue, New York 29, New York; Loan: Navy Department, Bureau of Medicine and Surgery, Audio-Visual Training Section, Potomac Annex, Building 2, Room 304, Washington 25, D.C.

General Statement: An arresting film on epidemic plague, its clinical manifestations, diagnosis, epidemiology, distribution and techniques for its control. Presentation is verbally well-organized but visually uneven, and slanted to a military audience facing contact with native populations in endemic plague areas. The principles taught will find application wherever plague is a potential or active public health problem, even though portions of the film are now obsolete.

Audience: Medical students; public health workers, including sanitarians and engineers; medical practitioners (in event of an epidemic); students of medical entomology and advanced bacteriology.

Content Description

This story of epidemic plague aptly opens with symbolic sequence of views of a vulture on a rooftop, a dead body in a tropical village street, an active family of rats, and the cycle of transmission of plague from rat to rat by means of fleas. The extreme gravity of epidemic plague is introduced through pictures of clinical cases of the several forms of the disease, notably of buboes. Techniques of palpation and aspiration of infected lymph nodes are shown. Narrative emphasis is placed on protection of the personnel who must examine patients, corpses and rats. Such protection is heightened for the pneumonic cases of plague, where droplet dissemination is a grave hazard. The technique of smear preparation from infected tissues is shown; and there is a clear photomicrograph of the stained Pasteurella pestis. The examination and disposal of infected cadavers is presented in shots and words. The world-wide distribution of plague in tropical areas is outlined by means of shaded maps. Methods are demonstrated for preliminary survey of rat populations. Techniques are shown for collection of rats and of their fleas for preparation of plague cultures from rat tissues of tests for rat infection by guinea pig inoculation, and finally of mapping of infected urban areas. A rat destruction campaign is outlined and shown in brief shots including methods of trapping, baiting, gassing, and starving the animals through elimination of feeding sources. Methods for the rat-proofing of buildings are demonstrated. The attack on the flea-infested native quarters includes dusting with DDT, quarantine, a passport system, destruction of native quarters, and the improvement of standards of hygiene. Protection of public health and hospital personnel by use of proper clothing, vaccination and the unusual aseptic precautions involved in management of this very dangerous disease are shown. A summary of the modern attack on plague is stated in a terminal title.

Appraisal

Subject Matter: The film seeks broadly to cover the entire picture of epidemic plague in every major facet, and to do this for a wide variety of military audiences. This film is a visual textbook chapter. Criticisms directed toward film content stem largely from the fact that the film has been outdated at many points by advances in methods of control and of therapy which have been developed since the time of film release. Examples of new information missing from the film include: application of DDT to rodent-infested areas by means of a fog which will destroy fleas which cannot be killed otherwise; the newer techniques of applying insecticides in residual sprays; the newest rat-killing agents such as 1080; the recent important results in the field of antibiotic therapy for plague which have sharply reduced mortality figures; and the present controversy over the value of plague vaccines. The narrative apologizes for it, but very dangerous bare-hand practices are seen all too often in the procedures here photographed. The materials filmed are those of a very real place, time and occasion. The authenticity and impact of the cases and of the epidemic proper give the content the quality of a scientific document which cannot be concealed by the post-facto lecture narration.

Presentation: The substance of this film is so gripping that the flaws of presentation are likely to be overlooked and minimized. However, the film's organization is inclusive and constructed after the model of a textbook chapter. It does not seek to separate the transient (i.e. treatments, methods of rat control, etc.) from the essentially timeless elements of its story (i.e. clinical material and epidemiology). Because of this, re-editing is now necessary to bring the film to current optimum usefulness. The film has a soundtrack lecture continuity rather than one of pictorial continuity. There is an overloaded narrative, with rather frequent dis-

sociations between track and screen. Apparently the film is edited from film pieces not originally conceived together. Military aspects of the film could well have been handled more subtly, with long-term peacetime use anticipated. Much of the photography is of field emergency shooting type, (i.e. many of the sunlit African scenes came off overexposed; shots do not fit together. The animation might have been better conceived and executed. The film is only moderately well done in a filmcraft sense. It is unfortunate that a film on so forceful a subject, which might well have been a milestone of visual teaching in tropical medicine was a partial sacrifice to war-time urgencies and ineptness.

Effectiveness: Epidemic plague is one of the most dramatic of all diseases, and even today possesses the audience psychology of the "Black Death". This is the actual raw material of the 1944 Dakar epidemic (French West Africa) and is exceedingly real and gripping; and the exotic African settings heighten the forceful audience reaction. The film is inclusive, packed with data, and can be relied upon to transmit the major facts about plague, despite its elements of obsolescence. The medical student, the student of tropical medicine, of bacteriology, of public health alike find the film of high impact to begin or fortify the learning of the disease plague.

Utilization

The audience should be prepared in advance regarding the time and place of the film's production, and the shortcomings of certain data. Any subsequent discussion can, if necessary, highlight the scientific advances. It should be possible to purchase the film and self-edit it for better classroom utilization. This would permit elimination of the obsolescent portions.

Reviewed by a Medical Film Institute Panel and
New York State Medical Society Panel

Prepared by Ray Trussell, M.D., and
David S. Ruhe, M.D.

Copyright 1951 by Medical Film Institute of the Association of American Medical Colleges

Subject Classification: CYTOLOGY

PINOCYTOSIS. DRINKING BY CELLS (1941)

16mm, 35mm, black-and-white, silent, 10 minutes
Author and Producer: Dr. Warren H. Lewis
Distributor: Wistar Institute, Philadelphia

Content:

In this picture Doctor Lewis shows macrophages, in liquid tissue culture media, manifesting an extraordinary phenomenon, described by him as a result of the study of motion pictures, which he has termed "pinocytosis." The filmy fringes of the cells are in constant activity--waving and folding over on themselves, enclosing globules of the surrounding medium. The enclosed globules can be seen to be carried toward the center of the cell, where they, after persisting for varying numbers of minutes, gradually grow dim and disappear. Both normal and rat sarcoma cells are shown.

Comment:

Like Dr. Lewis' other films this one is of great value for research and teaching. Yet even more than the other films the interpretative material is needed here. This is necessary for a precise understanding of the action and changes of the cells pictured.

Audience Suitability:

Medical and biological audiences.

Recommendation:

Suitable.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 3/19/47

Subject Classification: CYTOLOGY

NORMAL AND ABNORMAL WHITE BLOOD CELLS IN TISSUE CULTURES (1940)

16mm, 35mm, silent, monochrome, 16 minutes
Author and Producer: Warren H. Lewis, Dept. of Embryology, Carnegie Institute of Washington
Distributor: Wistar Institute, 36th St. and Woodland Ave., Philadelphia, Penna.

Content:

The film shows, by means of cinemicrography, white blood cells in cultures derived from normal and abnormal blood or tissues. In particular: neutrophile leukocytes; eosinophile leukocytes; lymphocytes; mononuclear leukocytes; myeloblasts; myelocytes; lymphoblasts; large lymphocytes; macrophages; Langhans' cells; epitheloid cells.

Comment:

The film gives a most impressive picture of its subject by means of sheer magnification of the cells. By this, the structure and movements of the cells are made visible in extraordinary detail. Still the film is merely a brillian record, but does not have the treatment of an instructional film. There are no titles to explain the structural details of the cells, and no superimposed markings to point out these details. The differences of the various cell types are not pointed out by titles and juxtaposition. The development of the cells is not shown in continuity, for which animation would probably be necessary. The nature of the film renders explanation on sound track advisable; and if this were possible, addition of superimposed markings and other supplementation might also be considered.

Audience Suitability:

Physiologists, biologists; medical and biological students. Perhaps also of general interest to general practitioners.

Recommendation:

Suitable as it is, within the limitations indicated above. Decision might be delayed until more physiological films are reviewed. In case of acceptance, it is suggested to communicate with the author on the need of preparing explanatory material to accompany the film.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 12/10/46

Subject Classification: CYTOLOGY

DIVIDING NORMAL ADULT RAT FIBROBLASTS IN VITRO*

16mm, 35mm, silent, black-and-white, 5 minutes
Author and Producer: Dr. Warren H. Lewis
Distributor: Wistar Institute, Philadelphia

Content:

Content shows mitotic division in fibroblasts as seen in tissue culture preparations. A series of different mitoses is presented showing the process of cell division in typical mammalian cells.

Comment:

The extreme magnification obtained on the screen plus the speeded up movement of the cell action permits unique visualization of structural processes. Nevertheless, the film is merely a cinematic record that can be fully understood and analyzed only by the trained cytologist. For this reason additional information, possibly in printed form, would be needed for less experienced viewers. The film is of high value not only because of the extraordinary presentation of its object but also because it deals with one of the most fundamental biological processes.

Audience Suitability:

All medical and biological audiences on all levels of training.

Recommendation:

Suitable. Submission to subject matter specialists appears unnecessary. If accepted the author should be requested to furnish a manuscript to go with the film.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 3/19/47

*This film is mounted on a reel with Dividing Cancer Cells in Vitro

Subject Classification: DENTISTRY

THE PROCESS OF HUMAN DENTAL CARIES (1944)

16mm, sound, color, 7 minutes
Type of Sound Track: Straight commentary
Producer and Distributor: Navy Department

Content:

Dental caries is the most common of all dental diseases. As example, animation shows normal first pre-molar: the microscopic structure of pulp, dentine, the enamel and its cuticle. Cuticle wears away. Enamel is 99% inorganic, mainly rods cemented together. A bacterial colony acts first upon the rods, which appear as a darkening area. Decalcification begins as concave depression. Disease may quickly reach dentine, and its tubulae. When bacteria reach these large areas sensation can be felt. Fibrils contract and become knotted. Bacterial infection now goes on. Penetration and caries process quicken. Fibrils may calcify and slow caries process. Disease progresses to pulp. Fibrilloblasts go through a series of changes, finally become shredded. Allows bacterial entry. Severe trouble now. Pain first symptom of pulp invasion. Lack of circulation of teeth causes poison to reach root. Treatment of root is now necessary.

Comment:

A very good presentation in animation of the process of dental caries. It can be assumed that this film was made predominantly for students of dentistry and dental technicians. Its pace is quite rapid and presupposes knowledge of the subject. The tone of the narration is somewhat on the grim and brisk side.

Audience Suitability:

Dentists, physicians, medical and dental students, dental technicians.

Recommendation:

Appears suitable.

Reviewer: Adolf Nichtenhauser, M.D.

Date: 3/3/47

"SWAB YOUR CHOPPERS" (1948)

From Stone Age man gnawing a bone to modern man, represented by McCorkle, a sailor whose food consists chiefly of sandwiches, icecream and other kinds of soft food. He does not like the toothbrushing routine and his laziness and ignorance, represented by two ugly figures which emanate from out of his body, dissuade him from proper oral hygiene. The result - the defects in his teeth are not visible but cause bad breath and make McCorkle not exactly popular with the ladies. Toothache prevents him from attending a dance and the usual remedies, hot water bottle, ice and drops, are of no avail. He has to submit to the drill of the dentist, but with the relief of his acute pain the treatment is not over. While his shipmates swim and play football he is on the way to the dentist, during the summer and he is still on the way in winter. Before he can leave the treatment he has to learn how to brush his teeth and then tries to indoctrinate his shipmates. While he is doing this, the correct method of toothbrushing is shown in animation, as is the proper use of dental floss. While he is still criticizing the toothbrushing method hf his friends in the terminology of a dentist, the film closes.

COMMENT: This film could not possibly be in greater contrast to the old "Oral Hygiene." The main stress here is on motivation which is expressed in terms very close to every one in the audience. The general laziness and unwillingness to do proper oral hygiene is taken for granted, and the inducement

is done by means of depicting the very obvious disadvantages resulting from bad breath and inability to participate in the measures of normal life, and the length and discomfort of dental treatment. The whole film is only some 8 minutes long, and the proper toothbrushing sequence not longer than about two minutes, but it is so clear that it can be retained, while in the old film there were so many CU's of the model, upper and lower and central teeth and outside and inside that every one was sure to lose the orientation on what was brushed, in which way and where. In addition, in the old film not only was the speed distorted, but two kinds of toothbrushing were shown.

This film was made by United Productions, in a grotesque and witty style, working with visual intimations and implication rather than plain detail. For instance, during the scene of the dental treatment the image from time to time vibrates violently and the patient himself is not visible but only his hand, with fingers clenching and unclenching. How far this treatment was effective, not only in terms of causing laughs but in terms of making men follow the routine is a question.

ILLUSTRATIONS: McCorkle at dentist's.
McCorkle with jaws bandaged, Laziness and Ignorance on either side.

"ORAL HYGIENE" - Produced by Dental School with the Bureau of Medicine and Surgery.

First title in tiny letters. Another title in form of chart explains the results of unclean mouth. Title describes material for oral hygiene. Toothbrushes are shown spread out on table. T. explains function of dental floss. Dental floss is demonstrated. T. gives instruction on how to use it and this is demonstrated. T. describes proper type of toothbrush. This is shown. Demonstration of toothbrushing on model in great detail with explanatory titles in between. Extremely long sequence shows in CU's actual toothbrushing at slowed-down speed, but it is not indicated that it is slowed down. T. recommends brushing with single sweep if gums have receded. Result of poor toothbrushing showing periodontia. T.: Brushing will take two minutes. Cleansing of tongue with same toothbrush. Series of titles gives advice on various forms of dentifrices and why and when they should be used. None of the dentifrices is shown, nor is their different effect explained. Rinsing of mouth. Gum massage. Long title describes reasons for keeping brush clean and method of cleaning, showing brushing brush on soap and working up a lather between the bristles. No title explains why brush must dry. T. advises purchase of natural bristle brush once a month, and on repeating the whole procedure after every meal and at night. T. advises on proper diet, eating of green vegetables, fruit and dairy products; on the need for clean

eating utensils. A shot showed dirty lunch counter and attendant with sore on mouth.

COMMENT: The film does not give any motivation for following the routine, apart from the chart at the beginning indicating the results of unclean mouth. The procedure of this film appears so time-consuming and meticulous that nobody will do it, especially not after every meal, as recommended. It is interesting during the whole toothbrushing sequence that no sailor is seen; everything is quite abstract, explained by model and on actual case. The only shots in which sailors appear are at the end when an unclean restaurant is shown. Due to the fact that the demonstration of toothbrushing is shown at slow speed the whole procedure appears to last even longer than it is. It is not indicated whether the brush should be cleaned with hot or cold water. The type of treatment plus the tininess of the lettering are evidence that at that time the principles of making training films were still unknown.

THE DUTIES OF A DENTAL TECHNICIAN

Introduction with shots of laboratories, treatment room, etc., pointing out the general duties of the dental technician who is a specialist. Loud music throughout. After introduction: Keeping room and himself clean, preparation for routine examination. Three instruments are shown and named, but the shot is too brief. Cooperation with Dental Officer; keeping of dental record. The technician must operate the X-ray machine and take the X-rays. He takes smears in case of gum infection. CU shows spreading of smear: "Smears are spread thinly on the slide so that organisms will be visible under the microscope." He fixes and stains slide and places it under the microscope, ready for the DO. He then develops the X-rays, rinsing, fixing and washing them. He checks their quality and files them.

Another appointment, for restoration of cavity. The technician cleans equipment and instruments and arranges instruments on working table. He operates the saliva ejector and the air syringe, helping the DO keep the area dry. He then mixes cement and amalgam.

Duties in all surgery demonstrated with a woman technician. Chemical and heat sterilization of instruments, laying them out. Preparation of room for operation, duties of technician during extraction of tooth. She works with DO as a team. Washing and sterilizing of instruments after use.

Oral prophylaxis. The technician working on his own in periodical scaling, but reports any unusual conditions.

Duties at sea where he has to work in cramped quarters and can apply what he has learned. Film ends showing technicians' insignia, first with one stripe, then two, and finally three stripes, and the insignia of the Dental Corps.

COMMENT: This is on the whole an excellent orientation film. It shows much better and in much shorter time what words could never demonstrate so clearly and concisely. Obviously, the film is not taken from the viewpoint of the technician himself but from that of an observer. The approach is dual: (1) it shows him executing his duties; (2) it also gives a general idea of the techniques he has to perform such as making of a slide or sterilizing. After seeing this film, any new technician will have a fair idea of what he will have to do and an implied idea of what he will have to learn.

ILLUSTRATION: Any shot showing DT at work with DO.

Film Notes

Dentistry * Anterior Acrylic Bridgework. 1945. Pathescope production.

Comments:

The procedure is shown completely. No diagrammatic presentation. Excellent from a photographic point of view, especially the view of the upper arch from below. Frequent MS of dentist. Commentary is rather rapid and crowded, no pauses. It can, however, be followed by a dentist. The film presupposes experience in dental techniques. It does not explain the basic techniques, but the performance of a modification. It is therefore not a training film for students. It is a first-class film on technical procedures designed for the advanced dentist. Too many long shots throughout the film.

Subject Classification: DERMATOLOGY--RESEARCH METHODS

SKIN STUDIES (1944)

16mm., sound, color, 25 minutes
Type of Sound Track: Straight Commentary
Producer and Distributor: Proctor and Gamble
Cincinnati, Ohio

Content:

The purpose of the film is to demonstrate research methods to determine the factors in soap that cause skin irritation, change in the fat content and in the mineral composition of the skin. It is shown how the Proctor and Gamble laboratory applies and develops methods for the investigation of these problems. Irritation is tested by the rather troublesome arm immersion test as well as by different types of patch tests and cups filled with soap solution applied to the arm. Simultaneous tests on one individual. Methods to determine loss of skin fats and changes of mineral composition.

Comments:

As a film this is an average, somewhat clumsy production but it shows clearly what it wants to show. The film does not deal with soap chemistry as such and does not explain the physical and chemical principles of the action of soap on the skin. It limits itself to the demonstration of a great many laboratory methods. The results of these studies are not clearly shown in terms of their objective, which is the improvement of soap manufacture. This objective, incidentally, is of little medical interest. However, the film may be of interest to specialists in the field of dermatological investigation and laboratory techniques as well as to physicians studying methods of skin testing.

Recommendation:

To be examined by subject matter specialists as to the indicated possible value.

If accepted,

1. Foreign languagescountries: transcription of narration necessary
2. All countries: information or literature on the laboratory techniques shown.
3. It is suggested to remove the music at the beginning and end of film.

Reviewer: Adolf Nichtenhauser
Date: 12/26/46

Subject Classification: DERMATOLOGY--PLASTIC SURGERY

TREATMENT OF WAR BURNS OF THE HAND (1943)

16mm, silent, color, 35 minutes
Author and Producer: John M. Converse, M.D., New York
Distributor: Davis & Geck, Inc., 57 Willoughby St., Brooklyn 1, N.Y.

Content:

The film was made at an American hospital in Britain during the war. The treatment of burns of hand and arm caused by gasoline or flashes of explosions as they were frequent during the war. The objective of the treatment is prevention of infection and stiffness. Poor results of inadequate treatment are shown first. The right procedure consists in early diagnosis of depth of wound, pressure bandaging in position of function; and plaster casts. The cast is soon removed for inspection and immobilization continued. Defects are covered by skin grafts. Painful burns are irrigated and enveloped.

Comment:

The film contains a great deal of information also important for peace time burns. However, the organization of the film is rather inferior. The film contains about 70 lengthy titles which put together without interruption by pictures would probably yield a readable article. The flow of the pictures is constantly interrupted by these titles and since the visual treatment itself is poorly organized it is rather difficult to obtain a consistent picture of the techniques shown.

Recommendation:

Not suitable.

Reviewer: Adolf Nichtenhauser, M.D.

DIGESTION (1931)

The organs of the mouth and esophagus are shown in drawings of the head with successively appearing legends naming the structures. Moving dashes are shown over the salivary glands but it is unclear what they mean. A man is seen adding water and saliva to a substance in two dishes. He holds the bottle with the substance in front of his chest but the angle of vision is so large that the label on the bottle cannot be read (it is starch). The diagram shows swallowing but the esophagus is rigid.

There is a drawing of the stomach with successive lettering. A simplified histological cross section of stomach wall and larger histological view of secreting gland. This may be meaningless for children who have no previous training in interpretation of histological structures. The laboratory technician adds artificial gastric juice to cooked lean beef.

Animation - faking X-ray of stomach movement. By X-ray we study the stomach in action. The intestines. Nothing on function of liver and pancreas. Histological cross section of small intestine. Shot of peristalsis in animal intestine (taken from film of Mayo Clinic, without indicating that this is not human intestine).

Diagram of villus showing absorption by "lacteals" and blood, but villus remains rigid.

Diagram of lymph flow, quite unclear. Large intestine, again with histological cross section. Film ends suddenly. The whole film has not the slightest relation to what the subject means for a child.

Most of the film is purely static and could have been shown better by illustrations. In this film it is clear that an attempt

is made to cover the whole subject without regard to whether or not the film medium is needed. Apparently it is simpler for the teacher to show the whole subject than to teach every aspect of it by the appropriate medium.

DIGESTION (1929)

Producer: Eastman Classroom Films
Distributor: Eastman Classroom Films (sale only); many educational film libraries.
Sale: $24.00
For rent from libraries.
13 minutes, silent, black and white; 16mm.
Study guide available.

Rating: Accepted.

Type of Audience: Senior high school, college; also for lay audiences.

Use: The film may serve in the elementary teaching of the subject. When shown to audiences without previous knowledge of the subject and of basic histology, the film requires elaboration. Otherwise it can be only partly understood although it may still give a rough impression of the structure of the digestive tract.

Content: This is an elementary presentation of the digestive tract, done for the most part in drawings with animation. The film deals with the following items: mouth and esophagus, action of saliva on starch; mechanism of swallowing; the stomach, its form and histological structure; action of artificial gastric juice on meat; stomach peristalsis; liver and pancreas; the small and large intestines, their histological structure and peristalsis.

Appraisal: The film gives a survey of the anatomy of the digestive system, with some histological detail, and indicates the function of some of the organs and structures shown. The presentation is correct with the exception of a few points: the duodenom is shown as part of the small intestines and not as a separate unit; it is not indicated in the film that the X-ray of the stomach peristalsis is not an actual Roentgen cinematogram but an animated drawing based on a series of Xrays; likewise it should have been stated that

DIGESTION (cont)

Appraisal (cont): the photographs of intestinal peristalsis show animal organs; the villus is presented as a rigid structure, with no indication of the swaying and pumping movements. The main weakness of the film is that much more is shown than is explained by titles and insufficiently worded labels. (It does not matter that the information can be found in the study guide; it belongs in the film.) Furthermore, some important functions and organs like salivation, swallowing, liver and pancreas are rather insufficiently presented. On the whole, while the film cannot be regarded as too skillful and inspiring a presentation, it will help to convey some basic information on the subject.

(Reviewed with Dr. Roy Upham, Associate Professor of Gastro-Enterology, New York Medical College)

DIGESTION (1929)

The organs of the mouth and esophagus are shown in drawings of the head with successively appearing legends naming the structures. Moving dashes are shown over the salivary glands but it is unclear what they mean. A man is seen adding water and saliva to a substance in two dishes. He holds the bottle with the substance in front of his chest but the angle of vision is so large that the label on the bottle cannot be read (it is starch). The diagram shows swallowing but the esophagus is rigid.

There is a drawing of the stomach with successive lettering. A simplified histological cross section of stomach wall and larger histological view of secreting gland. This may be meaningless for children who have no previous training in interpretation of histological structures. The laboratory technician adds artificial gastric juice to cooked lean beef.

no concept of complete structure & function

Animation - faking X-ray of stomach movement. By X-ray we study the stomach in action. The intestines. Nothing on function of liver and pancreas. Histological cross section of small intestine. Shot of peristalsis in animal intestine (taken from film of Mayo Clinic, without indicating that this is not human intestine).

Diagram of villus showing absorption by "lacteals" and blood, but villus remains rigid.

Diagram of lymph flow, quite unclear. Large intestine, again with histological cross section. Film ends suddenly. The whole film has not the slightest relation to what the subject means for a child.

Most of the film is purely static and could have been shown better by illustrations. In this film it is clear that an attempt

is made to cover the whole subject without regard to whether or not the film medium is needed. Apparently it is simpler for the teacher to show the whole subject than to teach every aspect of it by the appropriate medium.

THE DIGESTIVE TRACT, PART III

Superinposed drawing of intestine with successive labels. A model without labels. Situation model. Cadaver demonstration. Model. Cadaver stomach. Filling of stomach on dadaver. T: "An ulcer may develop in the stomach. A ruptured ulcer, like a leak in the plumbing system, must be promptly closed, and the passage of food may have to be sidetracked." Book illustrations of ulcer with pointer going back and forth without explaining the sketches. Preparation of stomach ulcer. A shot shows drawings of a leaking tea kettle, a leaking stomach and a leaking water tank. Then comes the shot of a book illustration showing a sketch of stomach duodenum anastomosis with a pointer going back and forth with no explanation whatsoever. Neither the form nor the function of the stomach is explained. A small intestine is taken from the model and practically removed from the field of vision so that the kidneys are exposed. Six seconds of two hands kneading small intestine of cadaver. T: "The small intestine where digestion and absorption continue". T: "The large intestine where digestion and absorption continue and waste is eliminated." Hands pulling out large intestine in cadaver. Peristalsis drawing of caterpillar, a swollen abdomen and a water hose and tap. After this a shot of a patient is shown with distended abdomen where the trained eye can see a pathological increased peristaltic wave. Peristalsis in exposed intestine. T: "Adhesions." Drawing of a party with tangled streamers over the tables, a tray of tangled ribbons and an open abdomen with adhesions which can hardly be distinguished. LA of operation with demonstration of adhesions. Drawing of appendix, normal and distended. LA of cherry stone. Three convused operative shots of region. Drawing of dynamite fuse under gasoline tank, instru-

ments holding up an appendix. Drawing of doctor examining patient with family in background in mortal terror. LA of CU of appendectomy by cauterization which is not explained. Shot ends with appendix being severed, so that audience believes that this finishes the operation. T: "Transillumination of the appendix to visualize the Pecoliths" The spleen. Model of entire abdomen - pointer points to and around spleen and pancreas. LA of cadaver. Liver. Liver is indicated from model and turned around. Camera remains centered on model. LA of cadaver.

Illustrations:

1. Drawings of adhesions.
2. Peristalsis.
3. Illustrations of ulcer.

REEL II

T: "The Gall-Bladder is a pear-shaped sac which lies under the liver. It stores the bile which is discharged into the intestine as needed." Demonstration on small animal in a shot which shows a shot of operation. T: "Gall-Bladder stones may form in the gall-bladder when the bile thickens. They may block its flow and cause gangrene of the gall-bladder, which requires removal." Book illustrations of stone bladder with bladder in upsidedown position. X-Ray of stones. Specimen of gall-bladder being opened with bile shooting up - bladder dissected and stones exposed. T: "A distended and distorted gall-bladder containing stones". Demonstration of bladder direct and in transillumination. Chronic appendix and stone bladder in same patient. Pathological specimen. T: "The organs of the digestive system are perfect even in the newborn". "Demonstration of the digestive tract by the Pneumo-Viscera method". " 'Pneumo-Viscera' is the method conceived and designated by the author to demonstrate the various

organs of the body in a position (in situ) by inflating them with air". Some extremely miserable and hardly distinguishable shots pretend to show inflation of organs. "The Epiglottis serves as a trap-door to prevent food from passing into the windpipe". Epiglottis shown in the cross-section of a head without movement. A man eating an apple. Then it is shown in superimposed animation. Course of food through intestines. Title indicates that food furnishes substances which are absorbed by the body. Old Whole circulation chart shows absorption of food by blood.